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SALARIES AND QUALIFICATIONS OF TEACHERS
and
OTHER CONDITIONS OF EMPLOYMENT
1957-58,
CANADIAN SERVICES COLLEGES
and
CANADIAN UNIVERSITIES

Prepared by:

~~Pay~~ Research Bureau

~~Civil~~ Service Commission

~~Ottawa~~

February, 1958

(4)

Salaries and Qualifications of Teachers

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PART I

Introduction

As a result of a request received from the Organization Branch of the Civil Service Commission, the Pay Research Bureau agreed to undertake a limited investigation of the salaries and other conditions of employment of academic staffs in Canadian universities.

The purpose of this request was understood to be to assist in examining the appropriateness of the present classification system and pay structure applying to the civilian teaching staffs at the Canadian Services Colleges, Department of National Defence.

SCOPE - From a preliminary examination of the area to be investigated it was obvious that certain criteria would have to be established in selecting the institutions which would be most useful for the purpose. At the same time, it would be necessary, for practical purposes, to keep the number of institutions within reasonable limits.

Since all students from the Canadian Services Colleges must study a further year at some other university or college to obtain a degree, it appeared appropriate to include the universities to which the students go to complete their courses. With over 90 per cent of the students proceeding to the University of Toronto, Queen's University, McGill University, University of British Columbia, University of Alberta, McMaster University and Carleton University, all were included.

In addition, Dalhousie University, University of New Brunswick, Université de Montreal, University of Western Ontario, University of Manitoba and University of Saskatchewan were selected.

These thirteen universities, all of which are large, important seats of learning, employ a substantial proportion of the teaching staffs at the university level and also provide representation from all parts of Canada.

SOURCES OF INFORMATION - The bulk of the information was obtained by interview with senior officers of the universities, all of whom were most co-operative. (For list of officers, see Appendix 1, page 66) If some of the data appear rather vague and inconclusive, it is because most universities are quite flexible in their approach to personnel administration.

To supplement the information on salary matters and other conditions of employment obtained directly, the Education Division, Dominion Bureau of Statistics, through special arrangements with the universities concerned, supplied detailed data concerning salaries and qualifications of the teaching staffs and, in addition, provided special tabulations and advice on many aspects of the investigation.

The Economics and Research Branch, Department of Labour, supplied information from their sample survey of scientific and technical professions, which gives some indication of the earnings of academic staffs at universities, in addition to their salaries.

Officials of the National Research Council were of considerable assistance in providing data concerning scientific research officer classes.

Useful data were obtained from bulletins of the Canadian Association of University Teachers, relating to salary ranges, maximum and minimum salaries being paid and median salaries for a large number of institutions in Canada.

PROBLEM - Examination of conditions of employment and salaries in the universities and Canadian Services Colleges points up a number of quite different conditions which make it difficult to draw any clearcut comparisons. These are, nevertheless, quite important factors in recruiting and in maintaining morale in the Service Colleges, and must be kept in mind throughout the analysis which follows.

At the Services Colleges the teaching staff is employed on a full-time basis for 12 months in the year, whereas in the universities the period of service for which the basic salary is paid, in the main, covers a period of eight to nine months. In addition to this basic salary, opportunities are available to quite a number of university staff to earn additional income through teaching extension and summer school courses and a few other assignments. Some members of the staffs are also able to supplement their income through part-time and summer employment in industry, government and other areas where their specialist skills are in demand. These opportunities are not available to the staffs of the Services Colleges.

However, in addition to this basic difference, there are a number of non-monetary considerations which have a bearing on the overall appraisal of the Services Colleges as compared with universities generally.

The first of these is probably the size of the universities as compared with the Services Colleges. The Services Colleges are much smaller than the universities covered in the survey, in terms of numbers of students, or in terms of the variety of courses being offered. However, they are giving courses which are integrated into the pattern of education in the large universities and therefore must be capable of bringing the students to a level of proficiency equal to that of the universities. A relevant point in this connection is that in Canadian universities the senior staff gives quite a number of the courses during the first and second year, in order to stimulate the interest of the students and provide a good foundation for later development.

Because the Services Colleges do not grant degrees and the students must go to another university to complete their courses, they may be less attractive to prospective staff applicants who have a keen interest in teaching and in watching their students develop specialized skills. At College Militaire Royale and Royal Roads, where only the first two years of university training are given, this factor would have a greater influence than at Royal Military College, where all but the last year of university course is given.

A second, and probably more important factor, which should be considered, is the feeling among university people that the opportunities to do research and gain recognition in the academic field are less at the Services Colleges than at the universities. The possibility of becoming frustrated because of not having graduate work is a further related factor mentioned by some officials of the universities as a possible deterrent to young teachers in applying for appointments.

It should be noted, however, that while pointing up certain features of the Services Colleges which, in their opinion, presented problems, several officials also praised the work being done at the Canadian Services Colleges.

PART II

Qualifications Required for Teaching Staff:

Canadian Services Colleges and Canadian Universities

In this Section an attempt will be made to compare the qualifications set out for use in the Canadian Services Colleges with those being used by the universities covered in the survey. In making these comparisons it is essential to keep in mind that the universities have not formal written specifications of the kind existing in the Civil Service Commission. Therefore, any comments made are based on opinions expressed by the officials interviewed and, with the authorization of the universities, on examination of the detailed data submitted by the universities in the survey "Salaries of Academic Staff in Universities and Colleges, 1957-1958" conducted by the Dominion Bureau of Statistics.

In addition to comments on the academic qualifications of staff at the various levels, reference is also made to the experience of the individuals employed at the various levels as measured by the number of years experience since obtaining the first university degree. This approach seems appropriate for purposes of this investigation because of the career development aspects usually associated with university teaching.

To facilitate comparison the universities covered have been divided into four groups -

- | | |
|-----------------|--|
| Eastern Group | - Dalhousie University, the University of New Brunswick and the Nova Scotia Technical College |
| Central Group | - Université de Montreal, Carleton University, Queen's University, McMaster University and the University of Western Ontario |
| Prairie Group | - University of Manitoba, University of Saskatchewan and University of Alberta |
| Big Three Group | - McGill University, University of Toronto and University of British Columbia |

Note - The Nova Scotia Technical College has been included with Dalhousie University and the University of New Brunswick in this section dealing with qualifications of teaching staff and in the data related to average salaries in the next section. By making this addition, a better balance between the arts and science faculties and engineering is obtained and thus the comparisons should be more appropriate.

Table 1
Teaching Staff by Highest Degree Earned and by Rank,
Selected Canadian Universities and Canadian Services Colleges 1957-58

	<u>Professors</u>			<u>Associate Professors</u>			<u>Assistant Professors</u>			<u>Lecturers</u>	
	Doctorate Master's Bachelor's	Doctorate Master's Bachelor's	Doctorate Master's Bachelor's	Doctorate Master's Bachelor's	Doctorate Master's Bachelor's	Doctorate Master's Bachelor's	Doctorate Master's Bachelor's	Doctorate Master's Bachelor's	Doctorate Master's Bachelor's	Master's Bachelor's	Master's Bachelor's
Eastern Group	12(2)	10(3)	2(2)	16(1)	4(3)	8(6)	12	15(4)	19(17)	1	2
Central Group	61(3)	20(8)	3	43(1)	19(7)	---	45(3)	29(7)	5(2)	13(1)	21(1)
Prairie Group	48(2)	14(9)	5(4)	64(5)	33(15)	12(9)	36(3)	32(12)	19(13)	1	11(2)
Big Three Group	73	28	23	77	22	9	83	51	29	40	36
Total	194	72	33	200	78	29	176	127	72	55	70
%	64.9	24.1	11.0	65.2	25.4	9.4	46.9	33.9	19.2	31.6	40.2
Canadian Services Colleges	16(1)	9(2)	--	9	8(2)	--	15	8(1)	4	4	28
											24(5)

Note - Figures shown in brackets () indicate the number of teachers in Engineering Departments included in the total for each classification and level of academic qualifications earned. In the Big Three Group the number of engineers at each level of Training for each rank is not available.

The data contained in this section and in the one which follows on average salaries being paid are confined to the departments of the universities teaching English, history, romance languages, political science and economics, mathematics, physics, chemistry and engineering, except agricultural, forestry and mining engineering. This group of subjects is similar to the group of subjects being taught at the Canadian Services Colleges.

Table I summarizes the data on all four levels of teaching staff by numbers employed in each rank, together with the academic qualifications. Although each level of teacher is examined in some detail later in the section, it is interesting to note at this point the rather sharp increase in academic attainment of the teachers at the various levels up to associate Professor, and the similarity between the levels of Associate Professor and Professor. For example, nearly 30% of the Lecturers are trained to the bachelor level, while less than 10% of the Associate Professors are still at this level. Conversely, less than a third of the Lecturers have reached the doctorate level, while at the Associate Professor rank, two-thirds have earned doctorate degrees.

For purposes of this analysis it is assumed that when the terms professor, associate professor, assistant professor and lecturer are used they mean teaching staff considered to be about the same level in all institutions. It must be remembered that teachers of engineering subjects appear to have lower academic qualifications in terms of degrees than teachers in the humanities and pure sciences and this has a tendency to show a greater proportion of teaching staff with lower degrees.

Teaching Staff by Median Number of Years
Since First Degree and by Rank
Selected Canadian Universities and
Canadian Service Colleges 1957-58

Table 2

	<u>Professor</u>	<u>Associate Professor</u>	<u>Assistant Professor</u>	<u>Lecturer</u>
Eastern Group	26.4	13.8	7.4	---
Central Group	29.6	16.6	10.9	8.1
Prairie Group	26.9	16.8	8.4	6.4
Big Three Group	28.9	18.2	12.5	7.6 (1)
Canadian Services Colleges	18.8	15.4	12.2	7.5

(1) Instructors II at University of British Columbia

It should be noted that in Part (b) of Tables 3,4,5 and 6 (All Departments excluding Engineering) it has been necessary to combine the figures for the Eastern and Central Groups to prevent disclosure of figures relating to specific universities in the Maritime Provinces.

More detailed data related to degrees earned and number of years since first degree are shown in Appendix 3 on Pages 70 - 74.

Lecturer

The qualifications for the rank lecturer at the Canadian Services Colleges are as follows:

"An Honours Bachelor's Degree with specialization in the subject to be taught, plus some teaching experience in the subject under consideration, or a Master's Degree with specialization in the subject to be taught, plus one year's teaching experience in the subject under consideration, teaching experience to be at a Senior Matriculation or University level.

The rank of lecturer is used in most universities as the entrance level of the teaching staff as is the case at the Services Colleges. At the University of British Columbia this level is called Instructor, Grade II. At the three universities in the Maritimes, Dalhousie University, the University of New Brunswick and Nova Scotia Technical College, the rank is of limited use with a total of only five lecturers in the three institutions. At the Universite de Montreal the entrance rank is Assistant Professor and is not included in this analysis.

Lecturers by Highest Degree Earned

(1957-58)

Table 3

(a) All Departments including Engineering

	<u>Doctorate</u>		<u>Masters</u>		<u>Bachelors</u>		<u>Total</u>	
	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>
Eastern Group	1	20.0	2	40.0	2	40.0	5	100.0
Central Group	13	33.3	21	53.9	5	12.8	39	100.0
Prairie Group	1	3.8	11	42.3	14	53.9	26	100.0
Big Three Group	40	38.5	36	34.6	28	26.9	104	100.0
Canadian Services Colleges	4	7.1	28	50.0	24	42.9	56	100.0

(b) All Departments excluding Engineering

	<u>Doctorate</u>		<u>Masters</u>		<u>Bachelors</u>		<u>Total</u>	
	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>
Eastern and Central Groups	13	33.3	22	56.4	4	10.3	39	100.0
Prairie Group	1	6.7	9	60.0	5	33.3	15	100.0
Big Three Group	Not available							
Canadian Services Colleges	4	7.8	28	54.9	19	37.3	51	100.0

Of the total number of lecturers reported in Central Group 87% hold doctorates or masters' degrees and, if those attached to engineering departments are excluded, this proportion is increased to 91%. In the Prairie Provinces out of the total of 26 lecturers only 46% hold doctorate or masters' degrees. However, if those in engineering departments are excluded the percentage is increased to 68%. At the three largest universities, 73.1% have progressed at least to the masters level, and if the engineering departments were excluded, this total would rise to well over 75%.

In terms of years since first degree, since this is the entrance level, all groups and the Canadian Services Colleges are about equal.

Generally, it would appear that the level of education required for a lecturer on initial appointment is at least a masters degree, except in engineering where the bachelor level is the predominant grade. However, it should also be noted that at three universities the normal requirement now is that the new lecturer should have completed his formal academic career to the doctorate level or at least close to this level.

Assistant Professor - The academic qualifications required for this classification at the Services Colleges are:

"A Master's Degree from a University of recognized standing with specialization in the subject to be taught, plus two to three years of relevant teaching experience at a University level, or a Doctor's degree with specialization in the subject to be taught with some teaching experience at a University level; initiative, good judgment."

Assistant Professor by Highest Degree Earned Table 4

(a) All Departments including Engineering

	<u>Doctorate</u>		<u>Masters</u>		<u>Bachelors</u>		<u>Total</u>	
	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>
Eastern Group	12	26.1	15	32.6	19	41.3	46	100.0
Central Group	45	57.0	29	36.7	5	6.3	79	100.0
Prairie Group	36	41.4	32	36.8	19	21.8	87	100.0
Big Three Group	83	50.9	51	31.3	29	17.8	163	100.0
Canadian Services Colleges	15	55.6	8	29.6	4	14.8	27	100.0

(b) All Departments excluding Engineering

Eastern and Central Groups	54	58.7	33	35.9	5	5.4	92	100.0
Prairie Group	33	55.9	20	33.9	6	10.2	59	100.0
Big Three Group	Not available							
Canadian Services Colleges	15	57.7	7	26.9	4	15.4	26	100.0

In eight out of eleven universities for which the information is available, a doctor's degree is stated to be the normal requirement plus varying amounts of experience. Again in the applied science field the academic qualification seems to be lower. From examination of the departments for which detailed data were compiled it appears that the universities have been successful in recent years in maintaining this standard although there are enough exceptions to indicate that the policy is not followed completely.

At the three largest universities, 82% (134 out of 163) of the assistant professors hold doctorates or masters' degrees, although detailed information is not available for one institution, it is estimated that the percentage would increase to 90% by excluding the engineering departments.

In the other groups, the percentage of staff holding doctors degrees in the non-engineering departments varies from 58.7% in the Eastern and Central Group to 55.9% in the Prairie Group as compared with 55.7% in the Service Colleges.

In terms of number of years since first degree, the Services Colleges compare favourably with the universities, with only the three largest having a higher median age for assistant professors and the Prairie and Eastern Groups considerably lower. The lower medians in these two groups may be explained, in part at least, by the substantially higher proportion of assistant professors holding bachelor degrees. In the Eastern Group, the rank of lecturer is not used extensively, thus making the entrance grade the assistant professor level in many cases. This latter factor seems also to have an influence on the median number of years since first degree at the level of associate professor, although not to the same extent.

Associate Professor - The academic qualifications of this rank at the Services Colleges are:

"A Master's Degree from a University of recognized standing with specialization in the subject to be taught, plus four to six years of teaching experience at a University level, or a Doctorate with specialization in the subject to be taught, plus two to three years of teaching experience at a University level in the subjects under consideration; standing or recognition in a specialized field; initiative and good judgment."

At the level of associate professor all universities now seem to be in agreement that a doctorate is a requirement. While experience does not have too important a weight, the minimum requirement seems to be at least ten years beyond the first degree with several universities indicating that the minimum would be somewhat higher. There are a few cases of associate professors with less than ten years of experience after the first degree.

Research and publication as well as demonstrated ability to teach become important factors in considering staff for this level in academic work.

At one university attention is also given to administrative ability when considering staff for promotion to associate professor.

Associate Professors by Highest Degree Earned
(1957-58)

Table 5

(a) All Departments including Engineering

	<u>Doctorate</u>		<u>Masters</u>		<u>Bachelors</u>		<u>Total</u>	
	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>
Eastern Group	16	57.1	4	14.3	8	28.6	28	100.0
Central Group	43	69.4	19	30.6	-	-	62	100.0
Prairie Group	64	58.7	33	30.3	12	11.0	109	100.0
Big Three Group	77	71.3	22	20.4	9	8.3	108	100.0
Canadian Services Colleges	9	52.9	8	47.1	-	-	17	100.0

(b) All Departments excluding Engineering

Eastern and Central Group	57	79.2	13	18.1	2	2.8	72	100.0
Prairie Group	59	73.8	18	22.5	3	3.7	80	100.0
Big Three Group	Not available							
Canadian Services Colleges	9	60.0	6	40.0	-	-	15	100.0

In terms of number of years since first degree, the Services Colleges have a higher proportion of associate professors with more than 10 years than any of the groups. However, in total, there are very few teachers at the associate level with less than 10 years experience since first degree. The median number of years of experience since first degree falls between 13.8 and 18.2 for all groups.

Professors - At the Services Colleges there are three grades of professors - 1, 2 and 3. The qualifications attached to these grades are as follows:

Grade 1

"A Doctorate with specialization in the subject to be taught, plus five to eight years of teaching experience at a University level, plus evidence of ability to organize and direct research in the field under consideration; an established reputation, and publications which would make him eligible for Professorship in a first class University."

Grade 2

"A Doctorate with specialization in the subject to be taught, plus eight to eleven years of teaching experience at a University level, plus evidence of ability to organize and direct research in the field under consideration; an established reputation and publications which would make him eligible for Professorship in a first class University."

Grade 3

"A Doctorate with specialization in the subject to be taught, plus eleven to fifteen years of experience in research or teaching; a reputation and publications which would make him eligible for Professorship in the best Canadian and American Universities."

It should be noted that in the specifications for Professor 1 and 2 the only difference is in the length of experience required whereas for the Professor 3, in addition to further experience, there is also the distinction made between a "first class university" and "the best Canadian and American Universities".

In all but one of the universities covered there is only one rank of professor usually with quite a long salary range in operation. In ten of the thirteen covered only a floor salary is stated with the top left open to provide complete freedom for the exercise of judgment in appraising the individual's ability in relation to other members of the staff, in considering the amount required to retain the individual's services and in relation to the ability of the institution to pay. At one university two classes of professor have been established with the higher rank having a floor but no ceiling.

In all universities and the Services Colleges a Ph.D. degree is a normal requirement for new professors although there are some full

professors holding a master's degree, mostly with many years of experience. Professors in many engineering departments hold masters' degrees only. There are also a few cases of full professors who hold bachelor's degrees.

Professors by Highest Degree Earned Table 6
(1957-58)

(a) All Departments including Engineering

	<u>Doctorate</u>		<u>Masters</u>		<u>Bachelors</u>		<u>Total</u>	
	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>	<u>No.</u>	<u>%</u>
Eastern Group	12	50.0	10	41.7	2	8.3	24	100.0
Central Group	61	72.6	20	23.8	3	3.6	84	100.0
Prairie Group	48	71.6	14	20.9	5	7.5	67	100.0
Big Three Group	73	58.9	28	22.6	23	18.5	124	100.0
Canadian Services Colleges	16	64.0	9	36.0	-	-	25	100.0

(b) All Departments excluding Engineering

Eastern and Central Group	68	75.6	19	21.1	3	3.3	90	100.0
Prairie Group	46	88.4	5	9.6	1	2.0	52	100.0
Big Three Group	Not available							
Canadian Services Colleges	15	68.2	7	31.8	-	-	22	100.0

At the Canadian Services Colleges the academic qualifications of those classified as professors are, on average, somewhat below the Central and Prairie Groups in total and to a greater degree when the engineering teachers are excluded. The eastern universities have a lower percentage of professors with doctorates.

At the three largest universities the overall total percentage of professors with doctorates is lower than at the Services Colleges. If the engineering departments are excluded it is estimated that the percentage would increase to about 72% which is slightly higher than at the Services Colleges.

The median number of years since first degree in all four groups is substantially higher for professors than at the Canadian Services Colleges ranging from 26.4 in the eastern universities to 29.6 in the central institutions. This compares with 18.8 years at the Canadian Services Colleges.

The universities covered in the survey are all old established institutions with many of the staff having spent a great number of years teaching. Since the Canadian Services Colleges assembled their staffs in recent years it is not to be expected that they would have as many professors with lengthy periods of experience.

However, it would appear that members of the staff are being promoted to the rank of professor earlier in their careers at the Services Colleges than at the other institutions. For example, at the three largest universities there are only 7 professors with between 15 and 19 years from their first degree and none are shown as professors with less than 15 years.

In the Central Group only two professors, one in economics with 13 years since first degree and one in physics with 14 years, are at this level with less than 15 years since graduation out of a total of 84 professors. In the prairie region, the situation is similar with two out of 67 at the full professor level with less than 15 years since first degree. The same pattern appears in the Eastern Group again with only two professors with less than 15 years.

At the Canadian Services Colleges eight out of the 25 professors included have less than 15 years' experience since first degree.

PART III

Salary Ranges and Salaries Paid

Salary Ranges

The basic salary ranges as set out in the following table are those applying to the 1956-57 and 1957-58 academic years as published in the releases of the Canadian Association of University Teachers. In making comparison between these rates and the rates at the Services Colleges one must keep in mind the differences in the period of work and other conditions of employment pointed up in the introduction.

A further qualification is also necessary in relation to this section. The rates, the amounts being paid and the medians shown are for the university as a whole and therefore apply to all faculties and departments. This is particularly significant in relation to the maximum being paid because of certain very high salaries paid to individuals in some faculties for which there are no comparable departments in the Services Colleges, such as to outstanding teachers in medical schools.

A basic difference of the salary systems used in the universities is that in five, Dalhousie, McGill, McMaster, Western Ontario and British Columbia, only floor salaries are set out. In a further five, Carleton, Queen's, Toronto, Manitoba and Saskatchewan, at the senior level only a floor salary is specified. This factor, together with the lack of annual salary increments makes for a very flexible approach to matters related to level of salaries within the various grades and to increases in salary which are considered annually. At only four universities are there specific increments stated for annual increases - New Brunswick, Montreal, Alberta. At Saskatchewan, below the Professor level, salary increments are set out.

Change in Minimum Rates, 1956-57 to 1957-58

Examination of these rates reveals that in almost all cases, except the University of British Columbia, substantial increases in the minimum rates were made between 1956-57 and 1957-58, with the rates for the higher ranks increasing substantially more than at the lower levels.

	U. OF TORONTO		McMASTER		WESTERN		MANITOBA		SASKATCHEWAN		ALBERTA		BRITISH COLUMBIA	
	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58
Assistant Professor														
Rate														
Floor	5000	5800	4000	5000	5000	5200	4300	5000	4500	5000	4360	5000	5000	5000
Ceiling	6500	7300	None	None	None	None	5300	6300	5500	6300	5360	6200	None	None
Annual Salary														
Increment	None	None	None	None	None	None	None	None	200	200	250	300	None	None
No. in Class	N.A.	N.A.	28	31	15	30	65	68	47	37	83	54	113	129
Pay														
Median	* 5469	* 6272	4980	5790	5200	5600	4700	5600	5175	5700	5060	5650	5400	5960
Minimum	N.A.	N.A.	4470	N.A.	N.A.	4800	4300	5000	4500	5200	4360	5050	5000	5000
Maximum	N.A.	N.A.	6240	N.A.	N.A.	6400	5200	6300	5500	5700	5560	6400	6500	8000
Lecturer														
Rate														
Floor	3000	4300	3000	4000	4000	4300	None	None	3700	4500	3760	4100	3500	4000
Ceiling	5000	5800	None	None	None	None	4300	5000	5500	6000	4310	4700	None	None
Annual Salary														
Increment	None	None	None	None	None	None	None	None	100	200	250	300	None	None
No. in Class	N.A.	N.A.	6	8	13	22	21	14	34	4	19	9	34	44
Pay														
Median	* 4106	* 4790	4440	5130	4500	4500	3800	4500	4130	5433	4110	4700	4470	4730
Minimum	N.A.	N.A.	4200	N.A.	N.A.	4000	3000	3300	N.A.	4700	3790	4200	3500	4000
Maximum	N.A.	N.A.	4680	N.A.	N.A.	5500	4250	5000	N.A.	5500	4310	4950	5600	5600

* Mean.

N.A. - Not Available

MINIMUM AND MAXIMUM RATES OF PAY AND AMOUNTS BEING PAID, SELECTED UNIVERSITIES,
1956-57 & 1957-58

Professor	DALHOUSIE		U. OF MONTREAL		McGILL		CARLETON		QUEEN'S	
	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58
Floor	6000	7500			7100	8000	6500	9000	6500	9000
Ceiling	None	None	N.A.		None	None	None	None	9000	None
Annual Salary										
Increment	None	None	N.A.	300	None	None	None	None	None	None
No. in Class	14	15	N.A.	46	99	N.A.	7	6	30	60
Pay										
Median	6500	7500		N.A.	8000	9000	8200	9100	7556	9500
Minimum	6000	5500	N.A.	N.A.	5000	8000	6900	9000	6500	8400
Maximum	6500	7500	N.A.	N.A.	25000	25000	N.A.	10500	8600	12000
Associate Professor										
Rate										
Floor	5000	6000			6046	6500	5300	7000	5500	7000
Ceiling	None	None	N.A.		None	None	6700	9000	7000	9500
Annual Salary										
Increment	None	None	N.A.	300	None	None	None	None	None	None
No. in Class	6	11	N.A.	41	110	N.A.	6	11	32	30
Pay										
Median	5200	6000		6500	6000	6750	6350	7500	6234	7400
Minimum	5000	5300	N.A.	N.A.	5000	6500	5400	6500	5200	6300
Maximum	6000	7000	N.A.	N.A.	12000	13000	6550	8200	7000	10500

Assistant Professor	DALHOUSIE		U. NEW BRUNSWICK		U. OF MONTREAL		McGILL		CARLETON		QUEEN'S	
	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58	1956-57	1957-58
Rate												
Floor	4000	5000	4000	4500	N.A.	5000	4800	5000	4100	5000	4500	5500
Ceiling	None	None	5000	6000	N.A.	6500	None	None	5500	7000	6000	7300
Annual Salary												
Increment	None	None	180	180	N.A.	300	None	None	None	None	None	None
No. in Class	16	19	31	32		68	135	N.A.	26	23	27	30
Pay												
Median	4500	5000	4306	5000	4500	N.A.	4800	5500	4825	6000	5298	6500
Minimum	4000	4300	4000	4500	N.A.	5000	4000	5000	4100	5400	4200	5000
Maximum	4900	5400	4800	5520	N.A.	N.A.	8000	9000	5600	6900	6000	7200
Lecturer												
Rate												
Floor	2800	3500	3000	3500	(class not used)	3100	3100	3500	2900	3500	3200	4000
Ceiling	None	None	4000	4500	" "	" "	None	None	4300	5000	4700	5800
Annual Salary												
Increment	None	None	120	120	" "	" "	None	None	None	None	None	None
No. in Class	5	2	0	2	" "	" "	68	N.A.	4	8	30	30
Pay												
Median	3500		N.A.		" "	" "	3800	4000	3725	5000	4066	5000
Minimum	3000	3000	N.A.	3600	" "	" "	3100	3500	3500	3500	3000	4000
Maximum	4200	3500	N.A.	4000	" "	" "	6500	8200	4000	5000	4800	5900

(1) 1957-58 data obtained directly from university.

N.A. - Not Available

Source - Bulletins of the Canadian Association of University Teachers.

Table 8

INCREASES IN MINIMUM RATES BY RANK AT CANADIAN UNIVERSITIES

1956-57 to 1957-58

<u>University</u>	<u>Professor</u>	<u>Associate Professor</u>	<u>Assistant Professor</u>	<u>Lecturer</u>
Dalhousie	\$ 1,500	\$ 1,000	\$ 1,000	\$ 700
New Brunswick	1,000	700	500	500
McGill	900	454	200	400
Carleton	2,500	1,700	900	600
Queen's	2,500	1,500	1,000	800
Toronto	1,600	1,000	800	300
McMaster	2,000	1,500	1,000	1,000
Western Ontario	500	500	200	300
Manitoba	1,100	1,000	700	no floor
Saskatchewan	(A) 1,200 (B) 1,100	800	500	800
Alberta	1,140	890	640	340
British Columbia	No change	No change	No change	500
Canadian Services Colleges	(1) 4 3 2 1	960 1,260 1,140 600	480	840

(1) Professor 4 was combined with Professor 3 into a new Professor 3 on May 1, 1957.

However, it should be pointed out that there are a number of instances where teachers are being paid less than the stated minimum for the rank and that the starting rate is not necessarily the minimum of the range.

Change in Median Salaries between 1956-57 and 1957-58

Comparison of change in salaries being paid between the two years is best illustrated by the change in median salaries for each rank since this figure is not affected by the very high or very low salaries which may be paid because of special circumstances. Table 9 below indicates the median salaries at each of the universities where the information is available for each year, together with the percentage increase for each rank.

The increase in median salaries for the current year over last year was generally quite substantial, with Queen's University and the University of Toronto showing the greatest increases at the upper levels and Queen's and Carleton University at the two lower levels.

It should also be noted that at the University of British Columbia, where the salary floors remained unchanged between the two years, the increase in median salaries was in the area of 10 per cent.

Salaries Paid

Before examining salaries being paid to teaching staffs in comparable departments of Canadian universities and those at the Services Colleges, it might be well to look briefly at the levels of pay for deans and heads of departments in order to appreciate more clearly the overall structure.

Deans - At only one university is there a salary scale established for deans. In the others there appears to be an additional increment amounting to anything from about \$1,000 to \$3,000 per annum above that which would have been paid if based on professorial duties only. In one case the increment was stated to be approximately one-half the professorial rate.

COMPARISON OF MEDIAN SALARIES, BY RANK
CANADIAN UNIVERSITIES, 1956-57 and 1957-58

Table 9

University	Professor			Associate Professor			Assistant Professor			Lecturer		
	1956-57	1957-58	% Incr.	1956-57	1957-58	% Incr.	1956-57	1957-58	% Incr.	1956-57	1957-58	% Incr.
Dalhousie	6,500	7,500	15.4	5,200	6,000	15.4	4,500	5,000	11.1	3,500	-	-
New Brunswick	6,156	6,950	12.9	5,087	6,000	17.9	4,306	5,000	16.1	-	3,800	-
McGill	8,000	9,000	12.5	6,000	6,750	12.5	4,800	5,500	14.6	3,800	4,000	5.3
Carleton	8,200	9,100	11.0	6,350	7,500	18.1	4,825	6,000	24.4	3,725	5,000	34.2
Queen's	7,556	9,500	25.7	6,234	7,400	18.7	5,298	6,500	22.7	4,066	5,000	23.0
Toronto (1)	8,287	10,110	22.0	6,867	7,967	16.0	5,469	6,272	14.7	4,106	4,790	16.7
McMaster	7,890	9,120	15.6	6,180	7,140	15.5	4,980	5,790	16.3	4,440	5,130	15.5
Western Ontario	(7,200 (8,050	8,500	-	6,300	6,700	6.3	5,200	5,600	7.7	4,500	4,500	NIL
Manitoba	6,900	8,000	15.9	5,600	6,600	17.9	4,700	5,600	19.1	3,800	4,500	18.4
Saskatchewan	(7,392 (8,200	(8,580 (9,525	(16.1 (16.2	6,225	7,080	13.7	5,175	5,700	10.1	4,130	5,433	13.2
Alberta	7,560	8,700	15.1	6,360	7,250	14.0	5,060	5,650	11.7	4,110	4,700	14.4
British Columbia	8,350	9,250	10.8	6,680	7,230	9.0	5,400	5,960	10.4	4,470	4,730	5.8

(1) Mean Salary

Source - Bulletins of the Canadian Association of University Teachers. The data on the Université de Montreal was not in sufficient detail to be included in this table.

In a few cases, in addition to a higher salary rate, payments for expenses incurred because of the position are made up to fixed amounts running from \$500 to \$2,000. The basis for the substantially higher salary being paid to the deans, in addition to the added responsibility assumed and the ability of the individual, was stated, at several universities, to be as compensation for the fact that the position is pretty well a full-time assignment. Thus there is not the same opportunity to earn additional income from other sources.

Examination of the salaries being paid to deans at the various universities, together with salaries being paid to heads of departments comparable to those in the Services Colleges reveals that in ten of twelve cases the dean earns more than any professor in the departments under his control.

In terms of average salaries, the deans earn from \$900 to \$3,200 more than the average for heads of departments. In five of the twelve universities the additional amount is over \$3,000.

Heads of Departments - The headship of a department, in many universities visited, does not in itself involve a higher salary than that of other teaching staff of equivalent rank. It was pointed out by several officers that even though the added responsibility is taken into account either through a fixed increment or in some other way as in one case, through the provision of an expense account, it does not necessarily mean that the head gets the highest salary in the department or that he is the most senior member. Examination of the records, where available, covering the departments of particular concern in this investigation does not reveal any instances where the salary of the head of the department is not as high as the salaries paid to others in the same department. However there are several instances where other members of the department receive as much.

Among those institutions where the headship was stated to carry additional remuneration the amounts varied all the way from \$200 to \$2,000 depending on the particular circumstances and the individuals involved. In one university the additional increment was stated to be \$300 for a small department and \$500 for a large department over what would have been paid to the individual had he not been head. In another instance the amounts

stated were \$200 and \$400 under the same circumstances. Actual differences in the average salaries being paid are substantially higher than these increments, due in all probability, to the fact that in most instances the head is the outstanding, or one of the outstanding, professors in the department.

Registrars - The position of registrar, although not under investigation in this survey, was discussed with a number of the officials. In every instance the conclusion was reached that the salary of the registrar was dependent mainly on the individual occupying the post and that the duties could vary all the way from a purely clerical operation to one of the most senior positions in the university.

The registrars at each of the Services Colleges is classified differently. At the Royal Military College, the position of registrar is a Professor 2, at College Militaire Royale the position is an Administrative Officer, Grade 5 and at Royal Roads it is an Assistant Professor.

Teaching Staff - As in earlier sections, all the difficulties of making direct comparisons apply but, in addition, a further complicating factor enters into the problem in relation to salaries paid. During the interviews an attempt was made to determine whether rank governs salary or vice versa, on initial appointment. Since many of the universities have established only floor salaries for the various ranks, they have tried as much as possible to maintain the levels of qualifications and have adjusted the salaries to a somewhat greater extent.

However, even with these important qualifications which must be attached to the comparisons which follow, some useful information may be obtained.

Professor

Average Salary of Professors
1957-58

	No.	Average
Eastern Group	24	\$ 7,281
Central Group	81	9,238
Prairie Group	67	8,515
Big Three Group	<u>126</u>	<u>9,717</u>
	298	9,121
Canadian Services Colleges	27	8,997

The average salary of \$9,121 when examined in relation to the subjects being taught indicate in general that professors of economics, political science, mathematics, physics, chemistry and engineering receive higher salaries than those in English, history or languages. This situation prevails throughout although there are a few exceptions. For example, professors of history in the three largest universities average \$9,583 as compared with \$9,559 for those in mathematics and in the Prairie Group professors of languages average \$8,467 as compared with \$8,430 for those in engineering.

At the Services Colleges, the professors of history have the highest average followed by economics and political science (only one professor), engineering, chemistry and mathematics in that order. The average in the language departments is slightly higher than that in the physics departments.

Associate Professor

Average Salary of Associate Professors
1957-58

	No.	Average
Eastern Group	29	\$ 6,157
Central Group	63	7,189
Prairie Group	105	6,978
Big Three Group	<u>109</u>	<u>7,307</u>
	306	7,060
Canadian Services Colleges	19	7,001

At the Associate Professor level the difference in average salary among the groups is much less pronounced than at the professor level with all groups about the same except the Eastern Group which is substantially lower. An examination of the various departments in each of the groups indicates that there is little difference among them that might not be accounted for by the ability of the individuals concerned rather than differences related to the subjects being taught.

Assistant Professor

Average Salary of Assistant Professors
1957-58

	No.	Average
Eastern Group	47	\$5,103
Central Group	81	5,901
Prairie Group	86	5,601
Big Three Group	<u>167</u>	<u>5,951</u>
	381	5,757
Canadian Services Colleges	25	6,401

Again at the Assistant Professor level the average salaries for three of the groups are fairly close together with the Eastern Group about \$650 below the overall average.

Although in general there do not appear to be any significant differences in the amounts being paid in the various departments there seems to be a tendency at the three largest universities to pay slightly more to assistant professors in physics, chemistry and engineering. This tendency is not so apparent in the other groups.

A significant change in the relationship between the salaries being paid in the Services Colleges and the universities becomes apparent at this level. Average salaries for assistant professors at the Services Colleges amount to \$6,401 or \$644 more than the average of all universities covered in the investigation whereas at the levels of associate professor and professor the average at the Services Colleges was just under that being paid at the universities. To some extent this might be related to the experience of assistant professors. In the Eastern and in the Prairie Groups the median number of years since first degree are 7.4 and 8.4 as compared with 12.2 years at the Services Colleges. In the other two groups median years of experience are about the same as in the Services Colleges but the average salaries paid are about \$500 lower.

Lecturer

Average Salary of Lecturers
1957-58

	No.	Average
Eastern Group	-	-
Central Group	39	\$ 4,895
Prairie Group	29	4,703
Big Three Group	<u>113</u>	<u>4,335</u>
	186	4,489
Canadian Services Colleges	58	5,254

The Services Colleges average is again considerably higher than the university average at \$5,254 or \$765 higher than the overall average for the universities and \$359 higher than the Central Group. The relationship of lecturers qualifications in terms of number of years since first degree which is noted above in connection with assistant professor does not appear at the lecturer level. All groups and the Service Colleges are about the same. In terms of academic qualifications, the proportion of Ph. D.'s is greater in the large universities and the Central area.

In looking at the average salaries for the four groups and the Service Colleges it is interesting to note that the three largest universities pay, on average, substantially more than any of the others at the professor level, a little more at the associate level and about the same at the assistant level as the second highest group. However at the lecturer level the average salary is well below either the Central or Prairie Groups.

TABLE 10

Average Salaries of Teaching Staffs by Department
and Rank, 1957-58Canadian
Services
Colleges

<u>Department</u>	<u>Eastern Group</u>	<u>Central Group</u>	<u>Prairie Group</u>	<u>Big Three Group</u>	<u>All Groups</u>	
	Dalhousie U. N. B. Nova Scotia Tech. College	Montreal Carleton Queen's McMaster Western Ontario	Manitoba Saskatchewan Alberta	McGill Toronto British Columbia		
<u>Total</u>	\$	\$	\$	\$	\$	\$
Professor	7,281	9,238	8,515	9,717	(298) 9,121	(27) 8,997
Associate Professor	6,157	7,189	6,978	7,307	(306) 7,060	(19) 7,001
Assistant Professor	5,103	5,901	5,601	5,951	(381) 5,757	(25) 6,401
Lecturer	-----	4,895	4,703	4,335	(186) 4,489	(58) 5,254
English:						
Professor	-----	8,911	8,406	9,420	(34) 8,963	(2) 8,400
Associate Professor	5,925	7,283	7,112	7,671	(30) 7,118	(2) 6,810
Assistant Professor	-----	5,483	5,600	5,431	(32) 5,471	(3) 5,980
Lecturer	-----	4,756	4,512	4,271	(35) 4,630	(9) 5,187
History:						
Professor	-----	9,133	8,410	9,583	(19) 8,871	(3) 9,780
Associate Professor	-----	7,143	7,250	7,075	(19) 7,174	(1) 7,320
Assistant Professor	5,070	5,760	5,675	5,900	(26) 5,679	(5) 6,060
Lecturer	-----	-----	-----	4,556	(13) 4,533	(3) 5,240
Romance Languages:						
Professor	6,688	8,811	8,467	9,343	(24) 8,526	(3) 8,620
Associate Professor	-----	7,165	7,170	6,875	(19) 7,029	(2) 7,320
Assistant Professor	4,785	6,044	5,650	5,731	(37) 5,694	(5) 6,167
Lecturer	-----	4,504	-----	4,455	(24) 4,364	(9) 5,247
Political Science and Economics:						
Professor	-----	9,208	8,700	9,915	(38) 9,316	(1) 9,420
Associate Professor	-----	7,640	6,933	7,309	(30) 7,251	(2) 6,960
Assistant Professor	4,948	5,846	5,550	5,869	(44) 5,699	-----
Lecturer	-----	4,980	-----	4,289	(14) 4,536	(3) 5,260

<u>Department</u>	<u>Eastern Group</u>	<u>Central Group</u>	<u>Prairie Group</u>	<u>Big Three Group</u>	<u>All Groups</u>	
Mathematics:						
Professor	---	9,358	8,529	9,559	(39) 9,074	(5) 8,940
Associate Professor	6,140	6,848	6,893	7,119	(44) 6,896	(3) 6,980
Assistant Professor	4,750	6,039	5,545	5,792	(49) 5,692	(3) 6,480
Lecturer	---	---	4,700	4,289	(25) 4,368	(9) 5,293
Physics:						
Professor	---	9,448	8,556	10,118	(39) 9,411	(4) 8,550
Associate Professor	6,116	7,209	6,796	7,655	(48) 7,188	(3) 7,000
Assistant Professor	---	5,788	5,700	6,267	(36) 5,903	(5) 6,160
Lecturer	---	---	---	5,125	(8) 4,900	(9) 5,320
Chemistry:						
Professor	---	9,231	8,644	10,010	(37) 9,224	(5) 9,012
Associate Professor	5,875	7,234	7,140	7,225	(36) 7,054	(4) 6,975
Assistant Professor	---	6,038	5,675	6,213	(41) 5,928	(4) 6,255
Lecturer	---	4,800	---	5,033	(12) 4,892	(10) 5,280
Engineering:						
Professor	7,714	---	8,430	9,650	(68) 9,174	(4) 9,390
Associate Professor	6,365	---	6,854	7,226	(80) 6,966	(2) 6,840
Assistant Professor	5,289	6,085	5,560	6,116	(116) 5,817	(1) 6,180
Lecturer	---	4,898	4,898	4,117	(55) 4,269	(6) 5,167

Note:

- (1) The average has not been calculated where there are less than four incidents or where all occur at one university regardless of the number, except in the Canadian Services Colleges.
- (2) Figures shown in brackets indicate the number of individual salaries included in the average.

Qualifications Required and Salary Rates: National Research Council -
Scientific Research Staff

The National Research Council, as a larger employer of scientific research workers and a government agency, hires staff in the pure and applied science fields, to some extent at least, from the same sources as the Canadian Services Colleges and Canadian universities.

When Royal Military College was re-established, after World War II, the salary ranges were quite close to those at the Research Council, from the Lecturer class at \$3,000 - \$3,600 through the intermediate classes up to Professor, Grade 4, at \$6,600 - \$7,200, as compared with the Junior Research Officer at \$2,700 - \$3,300 up to Principal Research Officer at \$6,200 - \$7,200.

The qualifications for the various classes at the National Research Council were approximately parallel and, although a number of changes have been made in the lower grades, the three senior classes still are in about the same relationship generally.

The National Research Council in organizing its operations has established six classifications for scientific research officers which provide for all the scientific research officers employed on a continuing basis from the recent graduate with his first university degree up to, but not including, directors and assistant directors.

Set out below are general qualifications assigned to each classification of the scientific research officer. The classification, research assistant, which is used in a limited way, is not appropriate for purposes of comparison in this investigation, and is not included.

Principal Research Officer

A Ph.D. or its equivalent.

A minimum of fifteen years of distinguished research experience.

An international reputation as an eminent research scientist, of the quality demanded for a research professorship in the best Canadian and American universities.

Salary Range - \$10,700 \$11,000 \$11,500

Note - This class is used for outstanding research officers and is limited in number to 25% of the total of Senior and Principal Research Officers. The salary range is identical with that of Assistant Director.

The qualifications required for this classification seem to be about the same level as those required for the most senior professorial class at the Canadian Service Colleges or at Canadian universities generally. As noted previously, the maximum salary for Principal Research Officer was the same as that of Professor, Grade 4, at the time, in 1948, when the classes were being set up for the Royal Military College.

Senior Research Officer

A Ph.D. or its equivalent.

Ten to fifteen years of experience in research, at least ten years in directing a group of research workers.

An established reputation and publications which would make him eligible for a professorship in a first-class university.

Salary Range - \$9,100 \$9,400 \$9,700 \$10,000

The qualifications for this classification would seem to fit classes of professor at the Services Colleges other than that of Professor 3. In fact, it had a salary range about the equivalent of Professors, Grades 1 and 2, when these were established originally.

Associate Research Officer

A Ph.D. or its equivalent.

Six to eight years of research experience, at least six years' experience in directing an investigational laboratory.

An established reputation and publications which would qualify him for an associate professorship in a first-class university.

Salary Range - \$7,500⁽¹⁾ \$7,800 \$8,100/\$8,400 \$8,700

Associate Research Officer qualifications and those of Associate Professor at the Canadian Services Colleges, while in the main similar, seem to require a longer period of experience than is required for Associate Professor and make no mention other than "or equivalent" to a Master degree which appears to be acceptable at the Services Colleges and to a lesser extent in the Canadian universities.

(1) For present incumbents only.

Assistant Research Officer

A Ph.D. or its equivalent.

At least two years' research experience subsequent to university training.

Enough completed research to qualify him for the rank of an assistant professor at a first-class university.

Demonstrated research ability, initiative, good judgment.

Salary Range - \$6,000 \$6,300 \$6,600 \$6,900 \$7,200 \$7,500

Note - The minimum of the class was the starting rate in 1957 for new incumbents with a Ph.D. degree.

These qualifications again appear similar to those used in the Canadian Services Colleges if one interprets "or its equivalent" to mean a Master's degree with more experience.

Junior Research Officer

A B.Sc. or its equivalent.

A first-class university record.

Considerable promise as a research investigator, initiative, good judgment.

Salary Range - \$4,600 \$4,800 \$5,000 \$5,200 \$5,400 \$5,600
\$5,800

Semi-annual increments may be approved in the regular manner for competent research engineers and scientists in this classification.

Note - Initial salary for new employees with an M.A. degree was \$5,000 in 1957.

The qualifications for this classification, which has a salary range similar to that of Lecturer at the Services Colleges, appears to be more in line with industrial requirements than with those of the universities, where more emphasis is placed on advanced academic training.

In the application of the qualifications required for the various classes, appraisal of the individual is the most important factor, with the emphasis on career development rather than job evaluation.

The average salaries for the various Scientific Research Officer classifications at April 1, 1957 and July 1, 1957 indicate the level and the extent of the salary increases which went into effect as of May 1, 1957. This comparison is not completely accurate, as it also gives weight to increases in salary for those officers who received annual increases at July 1, 1957.

	<u>April 1, 1957</u>	<u>July 1, 1957</u>	<u>Increase</u>
	\$	\$	%
Principal Research Officer	9,761	10,910	11.8
Senior Research Officer	8,438	9,453	12.0
Associate Research Officer	7,211	7,962	10.4
Assistant Research Officer	6,055	6,704	10.7
Junior Research Officer	4,756	5,107	7.4

Salary Changes Between 1950, 1956 and 1957

The following four tables contain a series of calculations based on the rates paid to teaching staff at the Services Colleges, the engineering classes under the Civil Service Act and National Research Council in 1950, 1956 and 1957 and the median salaries paid in 17 institutions across Canada in the academic years 1950-51 and 1956-57. Similar figures for 1957-58 academic year were not available when this report was being prepared.

The purpose of this comparison is to indicate the relative change which has taken place during the period and should not be construed as implying that the level of salaries paid in universities or the rates of pay applying in the Services Colleges or the National Research Council at any point of time is more appropriate than the salary rate at any other point of time. A further reason for not comparing level of salary between the Services Colleges and the universities lies in the fact that the amounts shown for the 17 major institutions are the basic salaries only and, in most instances, are for 8 to 9 months' service whereas the Civil Service and National Research Council rates are for a full 12 months' services less the usual three weeks' holiday leave.

For ease in calculation and because actual salaries being paid in earlier years are difficult to determine, the mid-point in each salary range is used for each class. Therefore, the percentage changes indicated should be considered only as approximations of what might have been paid if the staff had been distributed uniformly within the range.

One further warning. At September 1950, the salaries being paid in the Civil Service and the National Research Council were based on rates established in 1948. On December 1, 1950 these rates were revised upwards. Salaries paid at universities are usually established before the academic year starts and are unlikely to be revised before the next academic year begins. Under such circumstances, it would seem that a comparison of rates applying on December 1, 1950 would be more useful than those applying on September 1.

The median rate for professor in the 17 institutions in the 1950-51 academic year for Canada was \$5,683 or about \$200 below the mid-point in the range for Professor 2 at the Services Colleges. By the 1956-57 year the median had increased 44.6% to \$8,217 or to about the mid-point in the Professor 3 range, which during the same period had increased only 27.3%. In dollar terms the gain amounted to \$567 more than the mid-point of the Professor 2 range, which, in 1950 was \$197 higher making a total gain of \$764.

The median for associate professors was \$4,612 in 1950-51 or \$350 below the mid-point of associate professor range in the Services Colleges. By 1956-57 the median for the 17 institutions had increased 37.5% whereas the mid-point in the range for associate professor at the Services Colleges increased 27.0% thus making the two almost equal (\$6,343 for the median and \$6,300 for the mid-point). Similarly the differences between the medians and mid-points for the assistant professor and lecturer had also been reduced.

If one compares the percentage change from prior to the increases of December 1, 1950 with the rates being paid in the academic year 1956-57 in the universities and at September 1956 at the Services Colleges it will be noted that in the classes associate professor and assistant professor the increases in mid-points amounted to 40.0% whereas the median salaries in the 17 major institutions increased 37.5% and 36.7% respectively. Using these same two points in time, Professor 4 increased 23.9%, Professor 3, 31.0%, Professor 2, 34.2% and Professor 1, 36.5% as compared with an increase in median salary for professors of 44.6% in the 17 institutions.

In attempting to compare salary ranges for scientific research officers at the National Research Council with those of the Services Colleges between 1950 and 1956 and 1957 a complication arises from the fact that several changes were made in the classes of the Junior Research Officer and Assistant Research Officer in the National Research Council scales with the result that salary ranges for these two classes are not available on a comparable basis for 1950. However the classes Associate Research Officer, Senior Research Officer and Principal Research Officer remained pretty well the same over the period and may thus be used in examining the change.

The first point to note is that in 1950 prior to December 1, the four classes of Professor all lay within the range covered by the three senior ranks at the National Research Council starting at the mid-point (\$4,800) of the Associate Research Officer upwards to the second last step of the Principal Research Officer (\$7,200). Secondly that the class, Professor 4, was entirely within the range of Principal Research Officer while Professor 3 covered a small part of the Principal Research Officer range, part of the Senior Research Officer and the gap between the two. Professor 2 was within the range of Senior Research Officer and Professor 1 covered a part of the Senior Research Officer and Associate Research Officer ranges and the gap between the two.

After the revisions of December 1, 1950 all classes of professor were in a poorer position in relation to the scientific research officers at the National Research Council than prior to the revision. Only the

maximum rate (\$7,320) for Professor 4 continued to be within the range of Principal Research Officer which had a new minimum of \$7,100. In the revision of 1956, a further lowering of the relative positions of the professorial grades made the Professor 4 rank identical to the Senior Research Officer class whereas in September 1950 the minimum of Professor 4 was higher than the minimum of Senior Research Officer by \$1,300 (\$6,600 compared to \$5,300).

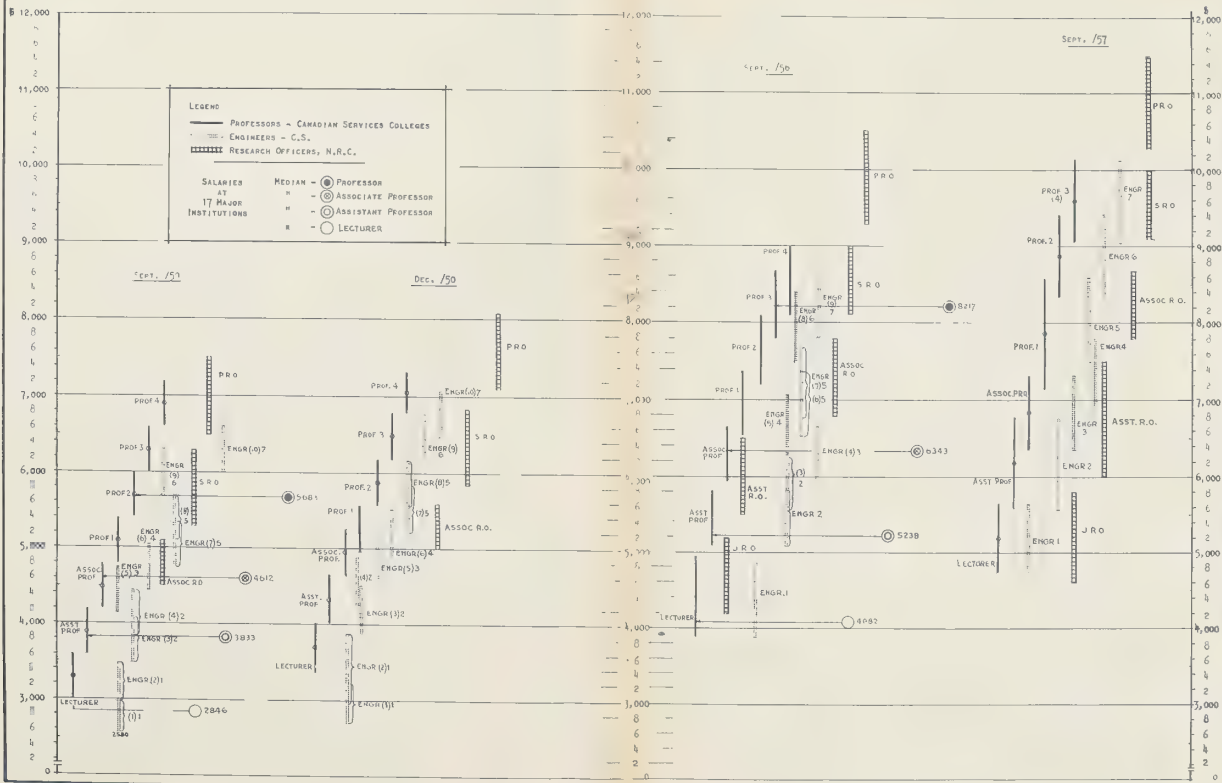
In 1957 a change in the grading system abolished the class of Professor 4 and included it along with Professors 3 in a new class of Professor 3 with a slightly lower minimum and a \$140 higher maximum than the Senior Research Officer class of the National Research Council. Thus following the revision of May 1957 the Professor 4 remained about level with the position that it had prior to the revision but the trend was reversed for other classes of professor which were in a somewhat better position. At the Associate Professor level there was a lowering of relative positions while at the Assistant Professor and Lecturer levels some improvement took place.

Comparison of the changes in salary ranges in the Engineer series with that of professorial grades reveals two shifts in relative position.

Professor, Grade 4 up until 1957, was a full grade higher than the present Engineer 7. In the adjustments of May 1, 1957, Professor 4 class was abolished and the incumbents of positions were placed in a new class of Professor 3, which was made equal to Engineer 7. The second point is that the Lecturer class, which had some advantage in salary in 1950 over the present Engineer 1, was equal to Engineer 1 in 1956 and 1957.

In the revision of 1950 the professorial classes, Professor 1, 2 and 3, did not receive as large an increase as the equivalent Engineer classes. However, by September 1956 the relative positions had been restored to those held prior to December 1950.

RELATIONSHIP OF PROFESSIONAL CLASSES AT CANADIAN SERVICES COLLEGES
TO ENGINEERS IN THE CIVIL SERVICE AND SCIENTIFIC RESEARCH OFFICERS, NATIONAL RESEARCH COUNCIL;
ALSO TO 17 MAJOR INSTITUTIONS.



Changes in Salary Rates for Teaching Staffs, Canadian Services Colleges
September 1, 1950, December 1, 1950 to September 1, 1956 and 1957

Table 11

	Sept. 1/50	Dec. 1/50	Sept. 1/56	Percentage Gain from Sept. 1/50 Dec. 1/50		Sept. 1/57	Percentage Gain from Sept. 1/50 Dec. 1/50	
Professor 4 (Incorporated into Professor 3 May 1, 1957)	6900 6600-7200	7050 6780-7320	8550 8100-9000	23.9	21.3		39.1	36.2
Professor 3	6300 6000-6600	6480 6180-6780	8250 7800-8700	31.0	27.3	9060 9060-10,140	52.4	48.1
Professor 2	5700 5400-6000	5880 5580-6180	7650 7200-8100	34.2	30.1	8880 8340-9420	55.8	51.0
Professor 1	5100 4800-5400	5268 4956-5580	6960 6540-7380	36.5	32.1	7860 7140-8580	54.1	49.2
Associate Professor	4500 4200-4800	4962 4656-5268	6300 5940-6660	40.0	27.0	6840 6360-7320	52.0	37.8
Assistant Professor	3900 3600-4200	4338 4020-4656	5460 5100-5820	40.0	25.9	6180 5580-6780	58.5	42.5
Lecturer	(1)3300 3000-3600	3696 3372-4020	4425 3900-4950	34.1	19.7	5190 4740-5640	57.3	40.4

Note - Percentage gain is calculated from the mid-points in the ranges.

(1) Lecturer R.M.C.

(2) Percentage gain for the class "Professor, Grade 4" is calculated at September 1, 1957, from the mid-point of the range of Professor 3 into which class the Professor 4 was incorporated.

Table 12

Changes in Salary Rates for Engineers

Civil Service

September 1, 1950, December 1, 1950 to September 1, 1956 and 1957

Present Classification	Sept. 1/50	Dec. 1/50	Sept. 1/56	Percentage Gain from		Sept. 1/57	Percentage Gain from	
				Sept. 1/50	Dec. 1/50		Sept. 1/50	Dec. 1/50
Engineer 7	6300 6000-6600	6780 6480-7080	8250 7800-8700	30.6	21.7	9600 9060-10,140	52.4	41.6
Engineer 6	6000 5700-6300	6480 6180-6780	7950 7500-8400	32.5	22.7	8880 8340-9420	48.0	37.0
Engineer 5	5220 4740-5700	5694 5208-6180	7110 6540-7680	36.2	24.9	7860 7500-8580	50.6	38.0
Engineer 4	4740 4440-5040	5208 4896-5520	6690 6300-7080	41.1	28.5	7350 6840-7860	55.1	41.1
Engineer 3	4440 4140-4740	4896 4584-5208	6300 5940-6660	41.9	28.7	6840 6360-7320	54.1	39.7
Engineer 2	3960 3480-4440	4392 3888-4896	5685 5100-6270	43.6	29.4	6180 5580-6780	56.1	40.7
Engineer 1	3030 2580-3480	3294 2700-3888	4425 3900-4950	46.0	34.3	5190 4740-5640	71.3	57.6

NOTE:

Present Classification	Equivalent Classification at		Present Classification	Equivalent Classification at	
	Sept./56	Dec./50		Dec./50	Sept./50
Engineer 7	9	10	Engineer 4	5	6
Engineer 6	8	9	Engineer 3	4	5
Engineer 5	6 and 7	7 and 8	Engineer 2	2 and 3	3 and 4
			Engineer 1	1	1 and 2

Table 13

Changes in Salary Rates for Scientific Research Officers
National Research Council
September 1, 1950, December 1, 1950 to September 1, 1956 and 1957

	Sept. 1/50	Dec. 1/50	Sept. 1/56	Percentage Gain from		Percentage Gain from	
				Sept. 1/50	Dec. 1/50	Sept. 1/57	Sept. 1/50 Dec. 1/50
Principal Research Officer	7000 6500-7500	7600 7100-8100	9900 9300-10,500	41.4	30.3	10,900 10,300-11,500	55.7 43.4
Senior Research Officer	5800 5300-6300	6350 5850-6850	8550 8100-9000	47.4	34.6	9550 9100-10,000	64.7 50.4
Associate Research Officer	4800 4500-5100	5300 5000-5600	7300 6800-7800	52.1	37.7	8250(1) 7800-8700	71.9 55.7
Assistant Research Officer	(2)		6000 5500-6500			6750 6000-7500	
Junior Research Officer	(2)		4700 4200-5200			5200 4600-5800	

Note - Percentage gain is calculated from the mid-points in the ranges.

(1) The minimum for present incumbents only is \$7,500.

(2) Due to a number of changes made in the salary structure for these classes comparable data are not available for September 1 and December 1, 1950.

Table 14

Median Salaries for Teaching Staff for 1950-51 and 1956-57
for 17 Major Universities by Rank

Professors	1950-1	1956-7	% Gain
West	\$ 5612	\$ 8076	43.9
Central	5941	8511	43.3
Maritimes	3896	5600	43.7
Total	5683	8217	44.6
Associate Professors			
West	\$ 4610	\$ 6303	36.7
Central	4708	6594	40.1
Maritimes	3528	4239	20.2
Total	4612	6343	37.5
Assistant Professors			
West	\$ 3969	\$ 5287	33.2
Central	3722	5363	44.1
Maritimes	3500	4476	27.9
Total	3833	5238	36.7
Instructors and Lecturers			
West	\$ 2965	\$ 4236	42.9
Central	2912	4069	39.7
Maritimes	under 2000	3421	----
Total	2846	4082	43.4
All Staff			
West	\$ 4272	\$ 5993	40.3
Central	4395	6135	39.6
Maritimes	3316	4619	39.3
Total	4183	5874	40.4

Source: Median Salaries for selected academic years for instructional staff at certain Canadian universities and colleges, Dominion Bureau of Statistics, Higher Education Section, Education Division.

Institutions Included: West: Manitoba, Alberta, Saskatchewan, British Columbia; Central: Bishop's, McGill, Queen's, Toronto, Victoria, Trinity, McMaster, Western; Maritimes: Acadia, Dalhousie, St. Francis Xavier, Mount Allison, New Brunswick.

PART IV

OTHER SOURCES OF INCOME

Additional Employment and Income from the Universities

Extension Courses - Twelve of the thirteen universities covered by interview conduct extension courses during the academic year and pay extra to the staff teaching such courses. In the other case, consideration is being given to instituting an arrangement whereby members of the staff may earn extra income from this source.

The extent to which the teaching staff as a whole may earn additional income from extension work varies substantially from one university to another. In some universities the extension program is quite heavy with the result that nearly all of the members of the Arts staff who want to do extension work have it available. In others the program is limited and involves only a few members of the staff. The courses given are mainly in the humanities field with limited opportunities in science and education.

Rates of remuneration also vary greatly amounting to from \$300 to about \$800 per full course. However, some professors may earn as much as \$1,000 to \$2,000 per year from this source depending on the courses given and the rates applying in the particular university.

Summer School - At all thirteen of the universities there are opportunities to teach summer school for a period of five to seven weeks. Here again the fields of activity are confined mainly to Arts and some areas of science and education. In recruiting teaching staff for summer schools the practice is to employ members not only from the university offering the program, but from other universities as well thus providing an opportunity for change in locale for the teacher as well as the opportunity to earn additional income. At one university the provincial government operates the summer school employing staff from a number of universities and colleges.

The fee for teaching summer courses varies somewhat but is usually in the area of \$450 to \$750 per course with some professors conducting more than one course. Thus a few would earn as much as \$1,500.

At some of the larger universities the scale of remuneration is more flexible. In one university the rates for summer courses are sometimes fixed in relation to the basic yearly rate assuming that the yearly rate is for nine months' service.

In those universities where it was possible to get an estimate of the staff involved in these two programs, it would appear that from 10% to 20% of the total teaching staff earned additional income from extension and summer courses with the concentration in the arts faculties. In order to spread the work and to prevent overloading, some universities have set limits of \$1,000 to \$1,500 on the amount of additional income which may be earned.

In addition to the above there are usually a few supplemental assignments which cannot be divided among the teaching staff. In these cases an honorarium is usually attached to the position.

An interesting plan which seems to have worked well is in operation at one university covering summer employment of the science teaching staff. This program is designed to provide encouragement for members of the staff to undertake research on the university grounds rather than use the period in other pursuits, many of which are undertaken because of the monetary return rather than the increased knowledge obtained. To qualify for a summer stipend the member of the staff must have reached the rank of assistant professor and have completed his Ph.D. degree. His research project must have prior approval and, in the opinion of the administration, the individual must be of sufficiently high calibre to warrant the additional expenditure of university funds.

At another institution some thought is being given to a similar sort of program for the staff in the humanities below the level of professor to assist in research. The Canada Council is also providing a number of grants to promote research in this area.

During the past two summers the National Research Council provided stipends of \$800 each to full-time staff in university engineering

and science departments to encourage scientific research in the universities. In 1956 about 250 such awards were made and last year about 400. This program thus provided \$320,000 additional income to university teachers in 1957. However, the program was discontinued beginning with the summer of 1958.

National Research Council Grants in Aid of Research - The National

Research Council makes grants in aid of research and provides financial support for certain travel, for the activities of its associate committees, for scientific conferences and for other special activities. Members of university staffs benefit directly or indirectly from these grants and provisions.

Mention is made of this program to indicate an opportunity which members of university staffs have in addition to any grants, fellowships or other remuneration which may be available from the universities or from the various foundations. While an individual staff member may not draw a salary from such grants an opportunity is provided to make a contribution to knowledge and become more widely recognized.

By assisting with travel grants university staff members are provided with funds to assist in their development which might otherwise have to be provided out of their own salary. This type of assistance is not available to members of the staff of the Services Colleges.

Opportunities for Outside Employment and Income

Although the majority of the universities covered in the survey indicated that they had a policy in relation to members of the teaching staff taking on assignments outside the university, both during the academic year and in the summer period, almost all pointed out that it was difficult to administer. It would appear that considerably more attention is paid to the effect of such activities on the university during the academic year than in the summer.

The consensus is, whether there is a formal policy or not, that outside employment during the academic year may be accepted providing it does not interfere with the work at the university and providing it is likely to contribute to the stature of the individual, and bring credit

to the university. The individual members are supposed to keep the administration informed of such activities. Since control is largely in the hands of the deans, particularly in the larger universities, there is a feeling among those interviewed, that interpretation and application differ greatly from one faculty to another even in the same university. At one university there is a standing rule that not more than three days per month may be devoted to outside employment.

The attitude of the universities, concerning acceptance of employment during the summer, while, in most instances, similar to that covering employment during the academic year, is more loosely interpreted and generally approval is given fairly freely providing the job is of an appropriate type.

A number of reasons for the quite liberal interpretation of the general policy were indicated in discussion with officials. It is considered desirable, chiefly among engineers and economists but also in other fields of professional and scientific activity, to have a portion of the teaching staff doing consulting and other professional work for at least a part of their careers in order to gain practical experience. In some fields where opportunity is quite limited, at least one university has given some thought to the possibility of the university itself doing a part of the financing in order to provide suitable outside employment.

By permitting staff to earn additional income the university is able to retain some outstanding men on it's staff who would not otherwise be available at a salary which the university could pay. In this connection one of the senior educators pointed out, and was supported by others, that until academic salaries are adequate it is not practical to attempt to restrict activities of the staff during the summer.

It is recognized that the university should wherever practical play its part in activities outside its own campus. One of the ways it can be of assistance is in providing highly skilled professionals to assist with special problems whether they are in government or industry.

On the other hand almost all interviewed recognized that there are inherent difficulties which can, and in some cases do, operate to

the detriment of the university when application of the policy gets out of hand. Several officials mentioned that in considering increases in salary and promotion consideration is given to the amount of outside activity undertaken. The man who limits such work and spends more time in scholarly pursuits at the university both during the academic year and the summer period has an advantage over the one who is adjudged to be too interested in outside employment. In the field of engineering the feeling seems to be that the staff is not as interested in research as the members of some of the other faculties and can be of greatest value to the university if they do a fair amount of outside consulting work.

In a few institutions some actions have been taken to limit the amount of outside work by setting a ceiling on the amount of income which may be derived from this source or from the combined salary plus other income. However, this is not a general practice.

Economists, engineers and scientists have much more opportunity to obtain outside employment in their fields than those in the humanities, particularly the men with established reputations. These are often the key members of the faculty to whom the students look for leadership. To place too many restrictions on such people would, in the opinion of some, be very difficult and could well result in losing their services altogether.

Precise information on the extent of income from outside sources received by teaching staff at universities is difficult to obtain. However, some impression may be obtained from a recent sample survey of scientific and technical manpower covering the year 1956 conducted by the Professional Manpower Section, Economics and Research Branch, Department of Labour.

In Table 15, which summarizes an examination of the questionnaires submitted by 327 professional people employed in teaching at the universities it is indicated that in the nine fields of specialization shown, 48% of those reporting had other professional income in addition to salary which accounted for 21% of their total income. In terms of the group as a whole this amounted to 12% of the total income received by both those who reported no additional income and those with other income.

These figures are rather interesting in view of the program in operation at one university, as mentioned previously, where the summer stipend for research is approximately 20% of the basic salary and a statement made in the annual report of the president of the Massachusetts Institute of Technology which states that their summer program has added an additional average of 10% to the base pay. (See Appendix 5, page 78.)

These data would appear to substantiate the suggestions made by officials at the universities that in the pure and applied science fields substantial sums are being made in addition to the income received from the universities.

University Teachers' Income, 1956
Sample Reported to the Economics and Research Branch
Department of Labour

Table 15

Field of Specialization	Teachers Reporting Salary Only		Teachers Reporting Salary and Other Income				No.	Total %	Total Salary and Other Income \$	% of Other Income to Salary %
	No.	Salary	No.	Salary \$	%	Other Income \$	%	Total \$		
Agriculture	60	381,786	16	98,087	86.1	15,770	13.9	113,857	495,643	3.2
Biological Sciences	24	133,656	18	133,780	86.3	21,150	13.7	154,930	288,586	7.3
Forestry	1	5,200	6	45,100	83.9	8,650	16.1	53,750	58,950	14.7
Geosciences	5	33,110	15	94,804	71.9	37,121	28.1	131,925	165,035	22.5
Architecture	4	26,800	3	19,400	46.9	22,000	53.1	41,400	68,200	32.3
Chemistry	29	167,857	36	282,113	85.4	48,110	14.6	330,223	498,080	9.7
Physics	14	92,907	20	144,724	82.6	30,383	17.4	175,107	268,014	11.3
Mathematics	14	97,266	11	76,333	86.1	12,300	13.9	88,633	185,899	6.6
Engineering	18	158,687	33	213,125	66.7	106,545	33.3	319,670	478,357	22.3
Total	169	1,097,269	158	1,107,466	78.6	302,029	21.4	1,409,495	2,506,764	12.0

PART V

OTHER CONDITIONS OF EMPLOYMENT

Promotional Opportunities

All of the universities stated they promote from within their own ranks wherever possible, but a number also pointed out that in recent years this has not been practical in many instances. The interpretation of the term "wherever possible" seems to vary somewhat from one university to another. In one case it was stated quite firmly that the university would never hire a new member if a reasonably adequate person could be found among the staff. At the other extreme it was stated that, particularly in the case of an appointment to a full professorship, the approach would more likely be to examine the qualifications of all those who might be available, regardless of their location, and only if the best of those available from existing staff was quite close to the best from elsewhere would he receive the appointment.

A complicating factor in understanding the whole matter of promotion lies in the fact that rigid establishments are not usual in universities. There may be some overall ratio covering the various ranks, but even this is not so rigid that worthy staff cannot be promoted when warranted. It was suggested by several universities that with the substantial increase in salaries being paid in recent years, more care may be exercised in promoting staff in the future. This applies particularly to promotion to full professor. It was implied that previously there had been some lowering of standards for the various ranks because of the relatively low salaries being paid.

In almost all of the universities visited, a committee, sometimes formal, frequently comprising the principal, vice-principal and at least some of the deans constitute a promotional selection committee which examines recommendations for promotion. In some instances the business officer or other senior staff members may be included on the committee. Promotion is usually considered at the time the budget for the forthcoming year is being prepared.

Usually no fixed amount of increase is given with promotion although in almost all cases a promotion involves an increase to at least

the minimum salary of the higher grade. However it could happen, if the increase is quite substantial, that it might be divided into two steps. Since in some institutions only minimum salaries for each rank are established, it sometimes happens that a member gets promoted without any increase in salary. However, this type of situation would appear to be unusual.

Pensions

All universities included in the survey provide pension plans covering the teaching staffs. The most recently established plan went into effect in June 1956..

Two general types of plans are in operation among the institutions. Seven of the universities have money purchase plans whereby the employee and the employer each put up a fixed percentage of salary. The money is used to purchase a pension, the amount of which is dependent upon the age of the member, type of annuity, etc.

In the remaining six cases the plan is of the unit benefit type. Under this type, the employee contributes a specified percentage of his salary with the university paying the balance necessary to provide a pension equivalent to a fixed percentage of the salary earned by the individual. Since the percentage of salary contributed by the employer under the unit benefit type of plan varies with the age of the staff it is not possible to calculate the employer's cost as a percentage of salary. However, one university stated that its share of the total amounts to slightly more than the amount contributed by the employees. In four of the six instances the pension amounts to 2% of earnings. In one the pension benefit is calculated in a manner similar to that under the Public Service Superannuation Act (federal) plan. The pension benefit provides for each year of service up to maximum of 35, 1/50th of the average salary for the three highest years with a limit of \$4200 per annum. In the sixth it is 1-1/2% of earnings.

A variation of the money purchase plan is also in effect in several of the universities whereby a part of the funds used to purchase an annuity is invested in equities. Under this arrangement a variable pension is provided which is thought to give some measure of security against inflation in later years.

Past Service Pensions - In nine of the thirteen institutions provision was made for including service prior to the coming into effect of the pension plan. The cost of this portion of the pension was absorbed in the majority of cases by the university or by the Carnegie Foundation grant made for the purpose. The amount of the past service pension varies. Several universities have increased the benefits under this portion of the pension plan along with the contributory portion up to a specified date. The universities absorbed the entire cost of the increase.

Vesting Provision - The vesting provisions of the various pension plans is an important aspect of the conditions of employment for university teaching staff. With full and immediate vesting of the employer's share of the cost the individual may move from one university to another without impairing his pension accumulation.

Generally in the university pension plans the employers portion of the regular contributions is vested immediately sometimes with the provision that the funds are used for the purpose of purchasing an annuity. There is some variation of the treatment of funds provided for the purchase of an annuity to cover past service since in many instances this has been provided in total by the university.

Death Before Retirement - The disposition of the accumulated funds on the death of an employee varies under the different plans. Under eight both the employer and employee contributions are returned to the beneficiary, under two only the employee contributions are returned and under one, twice the employee contribution is returned. Provision of group life insurance rather than reliance on the pension plan is intended in a number of instances to provide protection for the dependents of a deceased employee.

Total Disability Prior to Retirement - Here again provisions vary. In some the actuarial equivalent or other amount is payable immediately as a pension while in others the funds are returned.

Other Provisions - In almost all instances joint and survivor provisions are provided as an option to be made by the employee if he so desires.

It is usual that the employee in university pension plans may elect to receive pension payments in a variety of ways to meet his own particular need with the amount of the payments adjusted to take care of such election.

In one instance the employee makes the selection of the underwriter and of the plan best suited to his needs. The university holds the contract during the period of employment. However this is an unusual arrangement. In most cases there is only one plan but through election considerable choice of benefits is available.

The following table sets out very briefly some of the more important features of the plans in operation at the various universities.

While all universities covered by the survey have substantial pension plans in operation and, over the years, have improved the benefits accruing under such plans, it would appear, so far as pension benefits are concerned, that those accruing under the Public Service Superannuation Act are greater. However, the university plans provide for greater flexibility in choice of benefits and for more freedom of movement without impairing the pension accrued.

In addition to providing pension plans for those now employed, a number of universities are making ex gratia payments to former members of their teaching staffs to supplement the pensions accrued.

TABLE 16 PENSION PLANS OF CANADIAN UNIVERSITIES

<u>Institution</u>	<u>Type</u> (1)	<u>Compulsory or Voluntary</u>	<u>Maximum</u>	<u>Employee</u>	<u>Contributions</u> <u>Employer</u>	<u>Vesting</u> <u>Provision</u>	<u>Normal</u> <u>Retirement</u> <u>Age</u>	<u>Past</u> <u>Service</u> <u>Pension</u>	<u>Additional</u> <u>Contributions</u>	<u>Waiting</u> <u>Period</u>
Dalhousie University	M.P.	C.	2/3 of earnings at retirement or \$3,000	5%	5%	Immediate	65	Yes	Yes	1 yr.
New Brunswick University of	U.B.	C.	70% of average salary for highest 3 yrs. (max. \$4,200)	6%	Balance	None	65	Yes	No	1 yr.
Montreal University de	U.B.	C.	2% of earnings	5%	Balance	Immediate	65	Yes	No	1 yr.
McGill University	M.P.	C.	None	5%	5% to age 40 7-1/2% after 40	Immediate	65	Yes	Yes	None
Carleton University	M.P.	C.	None	5%	7%	Immediate	65	Yes	Yes	1 yr. for lecturers
Queen's University	M.P.	C.	None	7-1/2%	7-1/2%	Immediate	65	No	Yes	2 yrs.
Toronto University of	U.B.	C.	2% of earnings	5%	Balance	Immediate	68	No	Yes	None
McMaster University	U.B.	C.	1-1/2% of earnings	5%	Balance	Immediate	65	Yes	Yes	None
Western Ontario University of	U.B.	C.	2% of earnings	4-1/2%-6%	Balance	Immediate	65-70	Yes	No	2 yrs.

PENSION PLANS (CONT'D)

<u>Institution</u>	<u>Type</u> (1)	<u>Compulsory or Voluntary</u>	<u>Maximum</u>	<u>Contributions Employee</u>	<u>Contributions Employer</u>	<u>Vesting Provision</u>	<u>Normal Retirement Age</u>	<u>Past Service Pension</u>	<u>Additional Contributions</u>	<u>Waiting Period</u>
Manitoba University of	U.B.	C.	2% of earnings	6%	Balance		65	Yes	Yes	None
Saskatchewan University of	M.P.	C.	None	7-1/2%	7-1/2%	Immediate	67	No	Yes to 7-1/2%	None
Alberta University of	M.P.	C.	None	5-7-1/2%	5-7-1/2%	Immediate	65	No	Yes	None at Assoc. Professor 1 yr. for lecturer
British Columbia University of	M.P.	C.	\$7,200	5%	10%	Immediate	65	Yes	Yes	None

(1) M.P. - Money purchase
U.B. - Unit benefit

Group Life Insurance

All universities except one covered in the survey maintain group life insurance plans for their teaching staffs and pay a share of the cost. The contribution made by the employee is usually a fixed amount per thousand dollars of insurance but in a few instances the employee portion of the premium varies with age. The balance is paid by the employer. In overall terms this balance in most cases approximates 50% of the cost. In one instance the employer pays 100% of the cost and in another 80%. In connection with the cost of group insurance it should be noted that usually the net premium (total premium less dividends) varies from year to year depending upon the experience under each individual group policy. Because of this it is difficult to calculate the cost of the employers share of the premium.

At two of the universities the Teachers Insurance and Annuity Association of America plan is in operation. Under this plan the employee contributes 50 cents per month per unit of insurance. The number of units which he is entitled to purchase depends upon salary and the number of dependents he has. The value of these units decreases from year to year until it ceases entirely at age 70.

Should total disability of the employee occur before retirement, treatment under the various plans differs widely. Under one plan the employee receives payment of the principal amount of insurance in effect immediately upon total disability if it occurs before age 60. Under another he receives payment of a pension for a period of up to five years or the period of total disability whichever is the shorter. Under still another plan the disabled employee is relieved of all payments of premium on the policy although the policy remains in effect.

Group Life Insurance

Table 17

Institution	Plan Yes/No	Compulsory Yes/No	Contributions \$/mo./\$1,000		Coverage	Remarks
			Employee	Employer		
1	Yes	Yes	NIL	100%	Approx. 1 yrs. salary Max. \$10,000	Insurance Company
2	Yes	Yes	0.60	Balance	Double one yrs. salary No max.	Sun Life Assurance Co. of Canada
3	Yes	Yes	0.50	Balance	Approx. 1 yrs. salary Max. \$10,000	The Great West Life Assurance Co.
4	Yes	No	0.40	Balance	Max. \$10,000	The Canada Life Assurance Co.
5	Yes	Yes	50%	50%	Varies with age and salary	T.I.A.A. Plan (Decreasing Unit ceasing at age 70)
6	Yes	No	20%	80%	According to salary No max.	
7	Yes	Yes	0.50	Balance	One year's salary Max. \$15,000	
8	Yes	Yes	50%	50%	Varies with age and salary	
9	Yes	Yes	0.35	Balance	One year's salary Max. \$15,000	Sun Life Assurance Co. of Canada
10	Yes	Yes	0.40	.52	Approx. 1 yrs. salary Max. \$20,000	Sun Life Assurance Co. of Canada
11	No					
12	Yes	Yes	50%	50%	Varies with age and salary	T.I.A.A. Plan (Decreasing Unit ceasing at age 70)
13	Yes	Yes	0.60	0.32	Max. \$10,000	Male employees with dependents may double insurance at 0.50/mo./\$1,000 up to \$10,000

Group Hospital-Medical Insurance

Eight of the thirteen universities covered do not provide any plan to which they contribute covering hospital or medical services. In one of these cases there is a clause contained in the group life insurance plan covering surgical benefits up to a fixed maximum per claim. In two cases hospitalization is provided under a provincial plan for all residents of the province.

In four of the five cases where the university contributes to the cost of the group hospital-medical plan the cost is shared equally. In the other, the university uses the dividends received from the group life insurance scheme to reduce the costs to the employees of the hospital-medical plan. This has, in the past, amounted to approximately 20% of the total cost.

In only one of the plans is provision made for home and office calls, except post-hospital. In two cases supplemental major medical expense benefits (catastrophe insurance) are provided.

Grants and Fellowships for Research

All universities try, whenever possible, to obtain as many grants and fellowships for members of their staffs as possible, special emphasis being placed on members going on leave and for research to be conducted during the summer months. One university pointed out that such a policy was quite helpful in building up a good relationship between the individual and the university administration as well as in providing assistance to the individual members to increase their stature. In some cases it was indicated that the initiative was left largely to the individual but, once the initiative had been taken by the individual, university support was extended in the strongest possible terms.

Assistance in Increasing the Academic Standing of Teaching Staff

Policy of the universities in providing additional facilities such as time off for study or to take courses at their own or other universities varies widely from institution to institution.

The majority of those interviewed stated that no reduction in fees is made for members of the staff taking courses for credit. In one case fees are reduced by half; in another, the only charges made are for

"out-of-pocket" expenses such as cost of marking examination papers, reading theses etc., which amount to very little. Another university provides a straight dollar reduction in fees for each course.

For courses taken at other universities, the practice is also varied, six indicating that some assistance is given and seven stating that it is not their policy to pay anything towards such courses. In some instances, particularly for short courses, some universities would pay full costs, including travel expenses and full salary. Others may provide half salary and something towards other expenses or make a special grant of a fixed sum. The amounts involved vary widely and, within fairly broad limits, are based on a study of each case. This assistance is, of course, in addition to any funds which may be made available to the member from other sources such as fellowships, grants from private organizations, etc.

To a question concerning lightening the workload of a member endeavouring to increase his standing, eight of the universities stated that they would not make any allowance. Some pointed out that members of their staff are not so overburdened that they cannot undertake such work in their own time during the academic year and that they certainly can during the summer months. Others pointed out that they expect their staff to have completed their degree work before being employed and therefore the problem does not present itself. Most of the five institutions which indicated that the workload would be reduced added that this problem would be handled internally within the faculty and department.

Only one university stated that it would direct individuals to take additional courses, other than short courses, but all stated that they encourage the members of the staff to do so. Some said that they would advise on what was necessary to round out the training of the individual and provide for further advancement in rank.

Other Benefits

Five universities out of twelve for which information is available provide tuition free or at reduced rates for children of staff members. In one other case, reduced fees are not available for members of the staff, but the university provides for children of deceased members of the teaching staff. The amount of the reduction varies from the full amount of the

tuition fee to a fixed proportion of the fees or varying amounts depending on the financial position of the individual member concerned. In some cases it is necessary for the student to maintain a stated level of achievement to remain eligible for the reduced rates.

No arrangements were discovered where members of the teaching staff of one university could send their children to another university and receive preferential rates as is the case among some universities in the United States.

Removal Expenses

Treatment of removal expenses to be paid to new members of the teaching staff, like practically all other conditions of employment, varies widely but in all twelve cases some form of compensation to a new member is arranged.

The amount of payment varies with the rank of the individual concerned in some instances. For example, in one university, senior appointees to staff may receive total cost of removal, while intermediate appointees may receive the full amount of expenses up to a maximum of \$500 with the junior staff members rarely receiving anything at all. In another case, new members with the rank of assistant professor or above may receive full expenses up to a maximum of \$500 towards the cost of moving furniture and equipment. In other cases, new members of the staff coming from outside of North America may receive substantial sums to defray, or partly defray, the cost of moving. Several senior officers pointed out that the willingness on the part of the university to assume part or all of the expenses involved in changing place of residence had quite an influence on whether the prospective new member would accept an appointment.

Two universities do not pay removal expenses. In these cases the expenses would be paid by the university immediately, but the salary for the first year would be reduced by a like amount. In this way immediate cash would be available and some saving would be made on income taxes payable since the salary received would be lower.

However, in addition to the actual payment of removal expenses, there is another benefit on initial appointments. In a number of instances new members are appointed as of July 1, even though they may not report for

duty until mid-September. Salary accruing for this period is sometimes payable in the usual way and sometimes upon reporting for duty.

The whole problem of payment of removal expenses in most instances comes back to individual negotiation within some broad limits of policy. It depends on how much the university wants the individual concerned. The impression is obtained that payments for this purpose provide a useful technique in obtaining good men and that this is more satisfactory from the universities' point of view than taking removal expenses into consideration when setting the initial salary.

Leave

Arrangements for leave either during the summer period or at other times are not generally set out on a firm basis even though governed by a general policy. As a rule the policy is thought of as allowing one month's holiday leave during the period between convocation in the spring and the first faculty meeting in the fall - usually held in September. In one university it is specifically stated that the basic appointment is for nine months' service during which holiday leave of not more than 30 days may be taken. Deans and heads of departments are usually expected to handle the business of the departments on a year-round basis.

While the general rule is that one month's holiday should be taken after the close of the academic year, there appears to be little control exercised during the balance of the summer, when the members of the staff are expected to engage in some form of scholarly pursuit and to keep the university informed.

In addition to summer vacation, members of the staff get all statutory and other holidays to which the students are entitled.

Sick Leave

In only two instances are there policies covering sick leave. In a third case it was stated that the matter is causing some concern with the result that consideration is being given to setting up a uniform procedure. In one of the two cases where there is a policy it was stated that, if a member of the staff exhausted his sick leave credits, the university would be prepared to consider a further period to alleviate any hardship resulting from the illness.

In general, the universities are prepared to consider each case on its merits and in most instances would carry a permanent member of the staff on pay for a quite lengthy period. Few of the officers interviewed could recall a single case where pay had been stopped because of absence caused by illness.

Sabbatical Leave

Sabbatical leave is considered as a privilege in all universities covered with one exception where this type of leave is not granted. Although no policy is set out, at most of the universities it would appear that a member of the staff must be employed for at least six years, and in most cases seven, before being eligible for consideration and must serve at least a further seven years before he could be considered again. However, because of the difficulty in re-arranging the workload or of obtaining a replacement, as well as the additional cost involved, a number of those interviewed indicated that this type of leave is not granted very often. It was also pointed out that because the cost of such leave, if granted freely, would add substantially to the overall expenditure salaries being paid would probably suffer.

The most common salary arrangement is to grant half salary during the period of sabbatical leave. In two cases the rate varies from one-half to four-fifths, depending on the period of service prior to taking such leave and in two others the member may receive full salary for one term or half salary for two terms. In many instances, where sabbatical leave is granted, a fellowship or other form of income is also available so that the individual's total income is very close, or equal, to his basic salary.

Other Leave

All universities covered provide leave and funds to cover travelling and other expenses incurred in attending conferences and meetings of learned societies. Some are much more liberal in their treatment of expenses than others so that there is no policy which applies generally to all. However, it would appear that in almost all institutions at least a part of the expenses incurred in attending learned society meetings are paid if approval, usually by the dean, to attend is granted. If a paper is presented some pay the full cost.

The proportion of expenses paid by the universities for members attending conferences depends partly on the opinion of the dean or head of department as to the value of such conference to the university and partly on the funds available. In a number of cases, if the individual is a senior member of the faculty and is representing the university, all expenses would be paid.

Absences brought about by members of the staff taking on special assignments with boards or commissions during the academic year are usually treated in one of two ways. In the first place the acceptance of any appointments of this type requires prior approval by the superior of the individual staff member. If the period of absence is short no reduction in salary would normally be made. However, if the absence is for a lengthy period the individual would likely be put on leave without pay although, if in the opinion of the university the cause was sufficiently worthwhile, the salary might be continued at full rates.

Workload

The problem of the adequacy, in terms of numbers, of the teaching staff in quite a number of the universities visited is one which appears to have been under consideration for a long time, but up to now has not been resolved with any degree of precision or satisfaction. Several of those interviewed indicated that attempts have been made to appraise the situation, but because of many facets to the problem the matter has been put in abeyance, temporarily at least. Some of the problems mentioned as complicating the resolution of the problem, lie in the wide variety of methods used in teaching the various subjects.

In some courses the main lectures, possibly two hours per week, are given to large groups and the other one or two periods are taken up in small discussion or tutorial groups, laboratory periods, etc. In other instances, rather than have any large groups of students to teach, the classes are divided with the same professor giving the same lecture twice or two professors each taking one of the two groups. The dean in one of the larger faculties stated that, in his opinion, it was easier on the professor to give the same lecture twice than to lecture to one very large class. However, he stated that this was his personal opinion and that

many do not agree with him. In another university the opposite view was taken with equal conviction. On the whole it would seem that there is a tendency towards fairly large classes, providing, of course, that there is sufficient student interest for the main lectures. These large lectures are supplemented by smaller tutorial groups under the direction of an instructor or assistant.

Another problem in any attempt to equalize workloads within departments, faculties and the universities themselves lies in the difficulty of equating hours spent on seminars, discussions and laboratories with hours spent actually lecturing to students. Quite a variety of approaches are taken in an attempt to arrive at a reasonable solution to the problem. In some cases, two hours of laboratory supervision is considered to be the equivalent of one hour of lecture. In other cases three hours of laboratory supervision is considered equal to one hour of lecture and in still others, probably the majority, the equating is done in a more qualitative way.

Some of the universities make allowance in their distribution of the workload for committee work and administrative requirements. This seems to apply mainly to the heads of departments and the deans, with most of the other members of the staff taking a share of the responsibilities without any particular recognition being given through a lightening of the workload. The amount of research expected may also have a bearing on the teaching assignment.

In the assignment of particular courses to individual members of the staff almost all of those interviewed stated that the best and most senior men in the departments took courses in the freshman year, and to a lesser extent in the second year in order to stimulate the interest of the student and provide a good base from which to go on to advanced courses. A few mentioned that occasionally difficulty arose in applying this policy because of the greater interest by senior members of the staff in research and in the advanced courses, particularly in graduate work.

The consensus was that three separate courses totalling seven to nine hours a week of lectures, or the equivalent in terms of laboratory or seminar supervision, constituted a full workload. As a rule, not more

TABLE 18

Ratio of Teaching Staff by Rank
Departments of English, History, Romance
Languages, Political Science and Economics,
Mathematics, Physics, Chemistry and Engineering
1957-58

	<u>Professors</u>	<u>Associate Professors</u>	<u>Assistant Professors</u>	<u>Lecturers</u>
Eastern Group	24 (25.8)	18 (19.3)	46 (49.5)	(1) 5 (5.4)
Central Group	84 (31.8)	62 (23.5)	79 (29.9)	39 (14.8)
Prairie Group	67 (23.2)	109 (37.7)	87 (30.1)	26 (9.0)
Big Three Group	<u>124 (24.9)</u>	<u>108 (21.6)</u>	<u>163 (32.7)</u>	<u>104 (20.8)</u>
	299 (26.1)	297 (25.9)	375 (32.8)	174 (15.2)
Canadian Services Colleges	25 (20.0)	17 (13.6)	27 (21.6)	(2) 56 (44.8)

(1) The rank of Lecturer is of limited use in the universities included in the Eastern Group. Most initial appointments are made at the Assistant Professor level.

(2) The high proportion of Lecturers in the Canadian Services Colleges may be attributed, in part, to several factors, such as the bilingual aspects of College Militaire Royale, the lack of graduate students in the Services Colleges from which to draw assistants and instructors and the need for a strong tutorial staff.

than one new course would be included in a year because of the substantial additional preparation required to teach a course for the first time.

Recruitment

Again in the matter of recruitment of new members to the staff there are no uniform methods employed. Some universities use advertisements in scientific journals, particularly in those published in the United Kingdom and in Europe. Others stated that this is not necessary, that sufficient applicants of good quality are available at salaries that the universities are willing to pay. They say that no recruiting problems have as yet arisen although, with the expected growth in university enrolment, they do not expect this situation to continue.

Advertising for new staff seems to be a last resort by most universities. Most of the new appointees are located by the senior members of the staff through inquiry from their contacts in other universities in Canada and, in some instances, in the United States. In one university, where no advertising is done, the officer interviewed was quite emphatic that the best way to minimize the problem was to have an active staff on the lookout for possible new members all the time, and wherever possible, selling the merits of the particular university. Quite a number of highly-valued members of the staff had been recruited in this way. These people would never have responded to an advertisement in a publication.

In setting salaries on initial appointment the officers interviewed are divided almost equally on whether the rank or the salary is more important, but all emphasize that both rank and salary must be considered carefully in relation to the members already on the staff. The result is that it is sometimes necessary to grant salary increases within the organization before bringing in new members. The problem of rank and salary is less difficult where there are no maximum salary rates set for the classes. It is then possible to pay what is necessary to get the man and at the same time maintain the rank structure.

The experience of the National Research in this area may also be of interest.

The National Research Council does not do any newspaper advertising for scientific staff in Canada but occasionally uses British

journals in an effort to fill a particular need. There are several reasons for this approach to recruiting. In the first place, the high reputation of the National Research Council is so well known that it attracts applicants and secondly, above the junior level, the scientists already employed know pretty well the people who would make a useful contribution and who might fit into the organization. Applications above the entrance grade are usually made informally in the first instance to the specialists in the particular field of interest. At the entrance level there is a program through the universities inviting applicants in much the same way as students are invited to apply for scholarships.

In this study an attempt has been made to bring together a variety of facts and information concerning the salary structure and other conditions of employment as found in a representative group of large Canadian universities. It is hoped that the data may be useful in appraising the comparability of the salaries and working conditions of the professorial staff at the Canadian Services Colleges and the Canadian universities.

APPENDIX I

UNIVERSITIES COOPERATING IN THE STUDY

Dalhousie University	Dr. W.J. Archibald, Dean of Arts and Science D. H. McNeill, Business Manager
University of New Brunswick	B. F. Macaulay, Business Manager Miss E. G. McLeod, Registrar
Université de Montreal	M. Louis Casaubon, Treasurer General
McGill University	William Bentley, Assistant to the Principal
Carleton University	Dr. C. T. Bissell, President and Vice-Chancellor F. J. Turner, Bursar
Queen's University	Dr. W.A. Mackintosh, Principal and Vice-Chancellor M. T. Tillotson, Treasurer Miss Jean I. Royce, Registrar
University of Toronto	G. L. Court, Comptroller
McMaster University	Dr. G. P. Gilmour, Vice-Chancellor and Principal W. N. Paterson, Bursar
University of Western Ontario	R. B. Willis, Comptroller
University of Manitoba	Dr. H. H. Saunderson, President W. J. Condo, Comptroller
University of Saskatchewan	Dr. W. P. Thompson, President J. A. Pringle, Controller
University of Alberta	Dr. Andrew Stewart, President Mr. George Samuel, Assistant to the President
University of British Columbia	Geoffrey C. Andrew, Dean and Deputy to the President Dr. S. A. Jennings

APPENDIX 2

CLASSIFICATION OF TEACHING POSITIONS

CANADIAN SERVICES COLLEGES

LECTURER

DUTIES

Under supervision to teach intermediate and advanced courses by means of lectures, recitation and group discussions, the subject matter being on a level generally recognized as being of college undergraduate difficulty.

QUALIFICATIONS

An Honours Bachelor's Degree with specialization in the subject to be taught, plus some teaching experience in the subject under consideration, or a Master's Degree with specialization in the subject to be taught, plus one year's teaching experience in the subject under consideration, teaching experience to be at a Senior Matriculation or University level.

Semi-annual to \$5400

Effective May 1, 1957 \$4740, 4920, 5160, 5400, 5640

ASSISTANT PROFESSOR

DUTIES

Under general supervision to teach general courses at a graduate level in a field of subject matter specialization; to develop and modify course syllabi, course outlines, laboratory demonstrations to meet the specific need of the classes; to exercise originality in the planning and implementing of class instruction and in organizing extra class student work; to exercise discretion in the selection and use of teaching techniques and the method of presentation of course material; to perform other related academic work as required.

QUALIFICATIONS

A Master's Degree from a University of recognized standing with specialization in the subject to be taught, plus two to three years of relevant teaching experience at a University level, or a Doctor's Degree with a specialization in the subject to be taught with some teaching experience at a University level; initiative, good judgment.

Effective May 1, 1957 \$5580, 5880, 6180, 6480, 6780

ASSOCIATE PROFESSOR

DUTIES

Under direction to instruct in a very broad advanced or highly specialized phase of the subject matter field; to study new developments in the subject matter field through reading professional journals, attending meetings of professional societies, etc.; to assist the Department Head in planning scope of courses, establishing course objectives, and revising current courses or preparing new ones; to conduct one or more seminar courses lending direction and guidance to advanced students making an intensive study of the specialized phases of the subject matter field, and to perform other related advanced responsibilities.

QUALIFICATIONS

A Master's Degree from a University of recognized standing with specialization in the subject to be taught, plus four to six years of teaching experience at a University level, or a Doctorate with specialization in the subject to be taught, plus two to three years of teaching experience at a University level in the subjects under consideration; standing or recognition in a specialized field; initiative and good judgment.

Effective May 1, 1957 \$6360, 6660, 6960, 7320

PROFESSOR 1

DUTIES

Under direction to instruct in a very broad advanced difficult or highly specialized phase of the subject matter field, being an established Professor in one or more phases of his field of specialization; to exercise a high degree of ingenuity, creative imagination and independent judgment in the planning of programmes of studies and instruction.

QUALIFICATIONS

A Doctorate with specialization in the subject to be taught, plus five to eight years of teaching experience at a University level, plus evidence of ability to organize and direct research in the field under consideration; an established reputation, and publications which would make him eligible for Professorship in a first class University.

Effective May 1, 1957 \$7140, 7500, 7860, 8220, 8580

PROFESSOR 2

DUTIES

Under direction to instruct in a very broad advanced difficult or highly specialized phase of the subject matter field, being an established Professor in one or more phases of his field of specialization; to exercise a high degree of ingenuity, creative imagination and independent judgment in the planning of programmes of studies and instruction.

QUALIFICATIONS

A Doctorate with specialization in the subject to be taught, plus eight to eleven years of teaching experience at a University level, plus evidence of ability to organize and direct research in the field under consideration; an established reputation, and publications which would make him eligible for Professorship in a first class University.

Effective May 1, 1957 \$8340, 8700, 9060, 9420

PROFESSOR 3

DUTIES

Under direction to act as head of one of the major departments of the College; to maintain liaison with other Colleges and departments; to hold conferences; to perform original independent research in any phase of the subject matter field in which he is qualified for the purpose of making contributions to the knowledge within the field.

QUALIFICATIONS

A Doctorate with specialization in the subject to be taught, plus eleven to fifteen years of experience in research or teaching; a reputation and publications which would make him eligible for Professorship in the best Canadian and American Universities.

Effective May 1, 1957 \$9060, 9420, 9780, 10,140

Teachers by Rank, Highest Degree and Years Since First Degree

1957-58

Eastern Group - Dalhousie University, University of New Brunswick and Nova Scotia Technical College

Years Since 1st Degree	Professors		Associate Professors		Assistant Professors		Lecturers	
	Doctorate	Master's	Doctorate	Master's	Doctorate	Master's	Doctorate	Master's
45-49	2							
40-44	1	1(1)						
35-39			1					
30-34	1	1	1(1)	3(2)				
25-29	2	4(1)	1(1)		1(1)		1(1)	1
20-24	2(1)	2	1	1(1)	1(1)		1(1)	1
15-19	3(1)	1(1)	3	1(1)			1	
10-14	1	1	6	3(2)	4(3)	2	3(3)	
5-9			4			11	10(2)	6(6)
0-4						1	2(1)	7(6)
Number of Teachers	12(2)	10(3)	2(2)	16(1)	4(3)	8(6)	12	15(4)
							19(17)	1
Median for Rank		26.4		13.8		7.4		2
								2(1)

Note - Figures in brackets () show number of teachers in Engineering Departments included in the distribution.

Teachers by Rank, Highest Degree and Years Since First Degree

1957-58

Central Group - Université de Montréal, Carleton University, Queen's University,
McMaster University and University of Western Ontario.

Years Since 1st Degree	Professors		Associate Professors		Assistant Professors		Lecturers	
	Doctorate	Master's Bachelor's	Doctorate	Master's Bachelor's	Doctorate	Master's Bachelor's	Doctorate	Master's Bachelor's
45-49	1	2(1)						
40-44	5	6	1				1(1)	
35-39	7	1	1		1			
30-34	15	2(1)	1	2	1	1		1
25-29	7(2)	5(3)	3(1)	4(1)				1(1)
20-24	16	1(1)	1	5	3	1(1)	1	
15-19	9(1)	2(2)	14	2(1)	9	4		1
10-14	1	1	12	7(4)	13(1)	10(1)	2(1)	3
5-9			6	1(1)	21(1)	10(4)	2	6(1)
0-4							2(2)	2
No. of Teachers	61(3)	20(8)	3	43(1)	19(7)	45(3)	29(7)	5(2)
Median		29.6		16.6		10.9		8.1

Note - Figures in brackets () show the number of teachers in Engineering Departments included in the distribution.

Teachers by Rank, Highest Degree and Years Since First Degree

1957-58

NOTE: Teachers in other institutions are those teaching same subjects as taught at Defence Colleges
Prairie Group - Universities of Manitoba, Saskatchewan & Alberta

Years Since 1st Degree	Professors		Associate Professors		Assistant Professors		Lecturers	
	Doctorate	Master's	Doctorate	Master's	Doctorate	Master's	Doctorate	Master's
45-49	1							
40-44	3	1						
35-39	3	2 (1)	2					
30-34	9	1 (1)	1 (1)	1				
25-29	14	3 (2)	3 (1)	2	1			
20-24	9	4 (2)	1 (1)	4	7 (3)	6 (5)	2 (1)	
15-19	8 (2)	2 (2)	1 (1)	24	13 (4)	1 (1)	3	2
10-14	1			22 (3)	9 (7)	3 (3)	9 (1)	6
5-9		1 (1)		5 (1)	1	1	22 (2)	14 (4)
0-4							1	9 (7)
								4 (3)
No. of Teachers	48 (2)	14 (9)	5 (4)	64 (5)	33 (15)	12 (9)	36 (3)	32 (12)
							19 (13)	1
								11 (2)
								14 (9)
Median for Rank		26.9		16.8		8.4		6.4

Note - Figures in brackets () show the number of teachers in Engineering Departments included in the distribution.

Teachers by Rank, Highest Degree and Years Since First Degree
1957-58

Big Three Group - McGill University, University of Toronto, University of British Columbia

Years Since 1st Degree	Professors		Associate Professors		Assistant Professors		Lecturers (1)	
	Doctorate	Master's	Doctorate	Master's	Doctorate	Master's	Doctorate	Master's
45-49	1	3			1		2	
40-44	6	2	1	2	1	1	1	1
35-39	5	8	3	3	3	2		
30-34	13	6	7	7	1	1	3	
25-29	22	7	4	8	2	2	2	1
20-24	21	3	4	8	1	5	4	1
15-19	5	2	1	20	12	10	2	2
10-14				25	31	16	7	9
5-9				4	35	13	7	11
0-4							7	9
No. of Teachers	73	28	23	77	83	51	29	40
Median for Rank		28.9		18.2		12.5		7.6

Note (1) Instructors 11 included for University of British Columbia.

Teachers by Rank, Highest Degree and Years Since First Degree

1957-58

Canadian Services Colleges

Years Since 1st Degree	Professors Doctorate Master's	Associate Professors Doctorate Master's Bachelor's	Assistant Professors Doctorate Master's Bachelor's	Lecturers (1) Doctorate Master's Bachelor's
45-49	1			
40-44	2			
35-39	1			
30-34				
25-29	2	1	1	1
20-24	2	1	2	1
15-19	6 (1)	4	2	1
10-14	4	4	6	7
5-9	1	1 (1)	5	14
0-4			1	5
Number of Teachers (1)	16 (1)	9	15	28
Median for Rank	18.8	15.4	12.2	7.5

(1) Does not include 11 staff members for whom data are not available.

University Teachers' Income
Sample Reported to the Economics and Research Branch
Department of Labour

Appendix 4

Field of Specialization	Teachers Reporting Salary Only		Teachers Reporting Salary and Other Income				Total Salary and Other Income		% of Other Income to Total Income %
	No.	Salary \$	No.	Salary \$	Other Income \$	%	Total \$	%	
Agriculture Maritimes	--	--	--	--	--	--	--	--	--
	9	57,650	5	26,272	6,900	--	33,172	14	--
	30	186,421	2	11,620	1,600	--	13,220	32	--
	17	110,415	8	51,195	5,770	--	56,965	25	--
	4	27,300	1	9,000	1,500	--	10,500	5	--
Total	60	381,786	16	98,087	15,770	86.1	113,857	100.0	3.2
Biological Sciences Maritimes	1	5,000	--	--	--	--	--	1	--
	10	58,108	5	36,700	8,900	--	45,600	15	--
	9	43,850	7	51,980	6,250	--	58,230	16	--
	3	18,198	4	29,100	3,200	--	32,300	7	--
	1	8,500	2	16,000	2,800	--	18,800	3	--
Total	24	133,656	18	133,780	21,150	86.3	154,930	100.0	7.3
Forestry Maritimes	--	--	1	7,600	1,800	--	9,400	1	--
	--	--	1	5,500	2,000	--	7,500	1	--
	1	5,200	1	9,500	500	--	10,000	2	--
	--	--	--	--	--	--	--	--	--
	--	--	3	22,500	4,350	--	26,850	3	--
Total	1	5,200	6	45,100	8,650	83.9	53,750	100.0	14.7
Geo. Sciences Maritimes	3	19,610	4	22,105	16,550	--	38,655	7	--
	1	7,500	2	16,200	4,000	--	20,200	3	--
	--	--	6	36,299	11,971	--	48,270	6	--
	1	6,000	2	12,200	3,400	--	15,600	3	--
	--	--	1	8,000	1,200	--	9,200	1	--
Total	5	33,110	15	94,804	37,121	71.9	131,925	20	22.5

Field of Specialization	Teachers Reporting Salary Only			Teachers Reporting Salary and Other Income			Total Salary and Other Income			% of Other Income to Total Income %
	No.	Salary	No.	Salary	Other Income	Total	No.	%	\$	
Architecture Maritimes Quebec Ontario Prairies British Columbia Total	--	--	--	--	--	--	--	--	--	32.3
	--	--	--	--	--	--	--	--	--	
	3	20,300	1	6,600	18,100	24,700	4		45,000	
	--	--	1	5,400	1,400	6,800	1		6,800	
	1	6,500	1	7,400	2,500	9,900	2		16,400	
	4	26,800	3	19,400	22,000	41,400	7	100.0	68,200	
Chemistry Maritimes Quebec Ontario Prairies British Columbia Total	4	29,500	3	17,500	5,600	23,100	7		52,600	9.7
	4	32,100	11	76,545	14,450	90,995	15		123,095	
	14	72,070	11	109,700	16,380	126,080	25		198,150	
	4	12,387	4	38,018	5,680	43,698	8		56,085	
	3	21,800	7	40,350	6,000	46,350	10		68,150	
	29	167,857	36	282,113	48,110	330,223	65	100.0	498,080	
Physics Maritimes Quebec Ontario Prairies British Columbia Total	1	6,500	2	15,800	1,000	16,800	3		23,300	11.3
	3	21,100	5	37,779	9,100	46,879	8		67,979	
	7	47,900	5	37,645	4,783	42,428	12		90,328	
	3	17,407	6	42,400	14,200	56,600	9		74,007	
	--	--	2	11,100	1,300	12,400	2		12,400	
	14	92,907	20	144,724	30,383	175,107	34	100.0	268,014	
Mathematics Maritimes Quebec Ontario Prairies British Columbia Total	1	6,000	1	7,000	500	7,500	2		13,500	6.62
	4	29,600	1	4,200	800	5,000	5		34,600	
	3	16,400	4	26,233	4,850	31,083	7		47,483	
	6	45,266	3	20,800	2,450	23,250	9		68,516	
	--	--	2	18,100	3,700	21,800	2		21,800	
	14	97,266	11	76,333	12,300	88,633	25	100.0	185,899	

Field of Specialization	Teachers Reporting Salary Only			Teachers Reporting Salary and Other Income			Total Salary and Other Income			% of Other Income to Total Income
	No.	Salary	No.	Salary	Other Income	%	Total	%	No.	
				\$	\$	%	\$	%		%
Engineering	2	18,780	6	33,200	10,800		44,000		8	62,780
Maritimes	5	48,900	6	42,200	15,325		57,525		11	106,425
Quebec	10	81,007	9	56,800	34,900		91,700		19	172,707
Ontario	1	10,000	8	55,725	40,880		96,605		9	106,605
Prairies	--	--	4	25,200	4,640		29,840		4	29,840
British Columbia	18	158,687	33	213,125	106,545	33.3	319,670	100.0	51	478,357
Total						66.7				22.3

APPENDIX 5

Extract from Report of the President, 1957, of the Massachusetts Institute of Technology

The following extracts from the above-mentioned report indicate, to some extent at least, that problems facing Canadian universities are not unlike those encountered in the United States.

"TEACHERS - THE TOP PRIORITY

(1)

'The Committee recommends to every board of trustees ... (1) that the absolute highest priority be given to raising faculty salaries, ... with particular attention to increasing the spread between the bottom and the top (2) that action also be taken to provide at moderate cost such benefits as health and life insurance, etc.'

"In M.I.T.'s financial planning and in current fund raising, we give top priority to finding the means to increase faculty compensation. In the past five years the average salary of our assistant professors has been increased 15.5 per cent, that of full professors 15 per cent. We have thus achieved modest gains, but these are not enough. (The President's Committee recommends doubling the current national average in the decade ahead.) Substantial progress has been made in augmenting "fringe" benefits, including opportunity for summer compensation which has added an additional average of 10 per cent to our base pay. Retirement benefits have been increased. Group life insurance, which has long been provided at Institute expense, has recently been doubled. Health and medical services to staff members have been enlarged. This past June we provided at Institute expense major medical insurance for nearly all staff members and their immediate dependents. We maintain a special Education Loan Fund to provide low-interest loans to members of the staff who need assistance in financing the education of their children. We also participate in the Tuition Exchange Plan, but the Plan does not take care of all the faculty who wish to use it."

(1) Refers to the President of the United States of America Committee on Education Beyond the High School Level.

"At the suggestion of Alfred P. Sloan, Jr. '95, and with his help and that of the Alfred P. Sloan Foundation, Inc., we have experimented for two years with making monetary awards for outstanding performance to members of the faculty."

"The Institute's salary scale is relatively good compared with other major universities (although it is not as high as some), and it is substantially higher than the national average; but our main competition now comes from industry. We have been engaged in many rearguard actions to hold valuable members of our staff who are offered industrial salaries far higher than we pay. Even more distressing is the difficulty we have in attracting enough able young graduates to elect academic rather than industrial careers."

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